



XENTRY Diagnosis Kit 4

Guía del usuario

Mercedes-Benz AG

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Mercedes-Benz



Índice

1.	Novedades con XENTRY Diagnosis Kit 4	4
2.	Volumen de suministro del XENTRY Diagnosis Kit 4	6
3.	Primera puesta en servicio y configuración	7
3.1.	Configurar la red	8
3.1.1.	WLAN.....	8
3.1.2.	LAN.....	11
3.1.3.	Proxy.....	11
3.1.4.	WIS/ASRA	12
3.3	Instalar StartKey	13
3.2.	Acoplamiento del XENTRY Diagnosis VCI	14
3.3.	Configuración del XENTRY Update Service.....	15
3.3.1.	XENTRY Update Service con Retail Data Storage.....	15
3.3.2.	XENTRY Update Service sin Retail Data Storage.....	16
3.4.	Finalización de la configuración.....	17
3.5.	Exportación de la configuración.....	18
3.6.	Instalación, actualización y configuración de WIS/ASRA offline/ Standalone	19
3.6.1.	Instalación/Actualización de WIS/ASRA offline/Standalone	19
3.6.2.	Introducción de la StartKey WIS/ASRA en la WIS Configuration Tool	22
4.	Funcionamiento del XENTRY Diagnosis Kit 4	24
4.1.	Inicio del sistema	24
4.2.	Opciones de conexión.....	25
4.3.	Update Center	26
4.4.	Comutar release	27
4.5.	AddOns	28
4.6.	Impresoras e impresión	29
4.6.1.	Instalación de una impresora USB	29
4.6.2.	Instalación de una impresora de red	34
4.6.3.	Asistente para la instalación de controladores de impresora	43
4.7.	Uso del software de unidades de control disponible online	45
4.8.	Test breve automático (AKT).....	46
4.9.	XENTRY WIS / XENTRY Operation Time	49
4.9.1.	El nuevo sistema de información para el taller (XENTRY WIS).....	49
4.9.2.	XENTRY Operation Time – Operar más intuitivamente, buscar más rápido, encontrar más fácilmente.....	50
4.9.3.	Acceso a XENTRY WIS/XENTRY Operation Time a través del marco de XENTRY	51
4.9.4.	Acceso a XENTRY WIS/ XENTRY Operation Time a través de la sesión de diagnóstico.....	52
4.9.5.	Esquemas de circuitos específicos del vehículo vía "Dynamic Wiring Diagram"	53
5.	Componentes de hardware	55
5.1.	XENTRY Diagnosis Pad 2	55

5.1.1.	Características técnicas del XENTRY Diagnosis Pad 2	55
5.1.2.	Conexiones del XENTRY Diagnosis Pad 2	56
5.1.3.	Teclas e indicadores del XENTRY Diagnosis Pad 2	56
5.2.	XENTRY Diagnosis VCI	57
5.2.1.	Características técnicas del XENTRY Diagnosis VCI	57
5.2.2.	Conexiones y elementos de mando del XENTRY Diagnosis VCI	59
5.2.3.	Indicadores de estado y elementos de mando del XENTRY Diagnosis VCI	60
6.	Accesorios	61
6.1.	Accesorios de pedido opcional	61
6.2.	Técnica de medición XENTRY Scope	62
6.3.	Escáner de inyectores (escáner manual 2D).....	62
6.4.	Unidad de diagnóstico para baterías HV.....	62
6.5.	SBC Flashbox	62
7.	Herramientas de servicio.....	63
7.1.	ConfigAssist	63
7.2.	Update Center	63
7.3.	VCI Manager	64
7.3.1.	Llamar VCI	64
7.3.2.	Actualización del firmware del XENTRY Diagnosis VCI.....	65
7.3.3.	Recuperación del sistema XENTRY Diagnosis VCI	67
7.4.	PDF Center.....	69
7.5.	Support Tool	70
7.6.	VCI Monitor.....	72
8.	Servicio Postventa y asistencia técnica.....	73
9.	Directrices de licencia de Windows 10 IoT LTSC Enterprise	75
10.	Lease Agreement for Microsoft Software Products	82
11.	Product Terms Windows 10 IoT CLA	87
12.	Certificaciones WLAN.....	107
13.	FAQ: preguntas frecuentes	113
14.	Glosario	116
15.	Índice de ilustraciones	118

1. Novedades con XENTRY Diagnosis Kit 4

Concepto de taller conocido

El nuevo concepto de equipos de diagnóstico se compone, como en el XENTRY Diagnosis Kit 3, del ordenador de diagnóstico y de un multiplexor: XENTRY Diagnosis Pad 2 y XENTRY Diagnosis VCI.

Optimizaciones fundamentales en XENTRY Diagnosis Kit 4:

- Nuevo XENTRY Diagnosis Pad 2
- Conexión WiFi modificada entre XENTRY Diagnosis Pad 2 y VCI.
- El XENTRY Diagnosis Pad 2 presenta un visualizador multitáctil capacitivo mejorado que le permite el trabajo en entornos luminosos y además presenta una imagen nítida.
- Batería de recambio en XENTRY Diagnosis Pad 2

Sencilla integración informática

- **La variante de conexión ya conocida:**
La conexión entre XENTRY Diagnosis Pad 2 y VCI se produce, como de costumbre, independientemente de la infraestructura informática del taller.
Nuevo: en XENTRY Diagnosis Pad 2 hay montada una segunda tarjeta WLAN que establece la conexión entre XENTRY Diagnosis Pad 2 y VCI.
- **Enlace WLAN:**
El XENTRY Diagnosis Pad 2, al igual que el modelo predecesor XENTRY Diagnosis Pad, va enlazado directamente en su red del taller. En la primera puesta en marcha, el ConfigAssist le guiará durante la instalación.

Actualización online

El XENTRY Update Service es nuestro estándar para suministrar siempre a su XENTRY Diagnosis Kit 4 con actualizaciones de release, DVD Regio e instrucciones de servicio digitales.

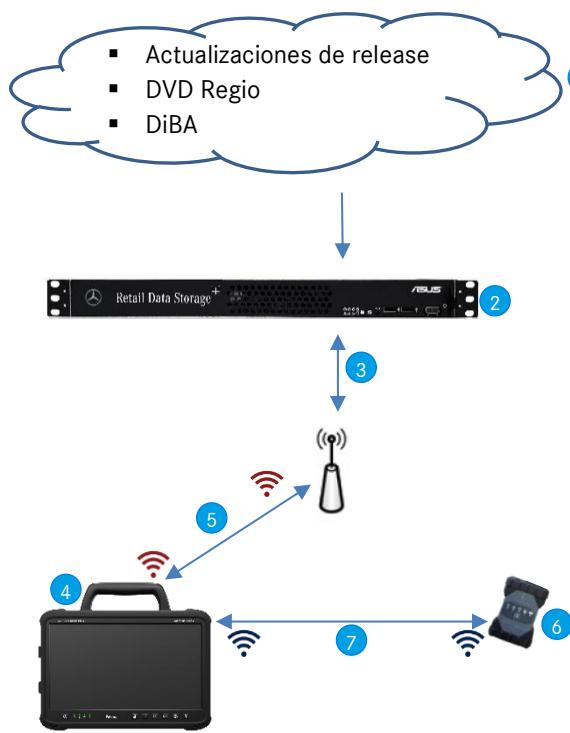
- Las actualizaciones de diagnóstico son descargadas, en función de la configuración, por la noche a través de internet en su Retail Data Storage y desde allí se distribuyen a través de la red del taller a XENTRY Diagnosis Pad | Pad 2.
- La "Zero-Time-Update" se encarga de que las actualizaciones de software de diagnóstico se transmitan al XENTRY Diagnosis Pad | Pad 2 en segundo plano. Durante ese tiempo, podrá seguir trabajando de la forma habitual. Tan pronto como el proceso haya concluido, se le informará de que puede instalar la nueva actualización de software. La instalación dura poco, generalmente unos 5 minutos; luego podrá seguir trabajando con su XENTRY Diagnosis Pad | Pad 2 de la forma habitual.
- El centro de actualización (Update Center) le ofrece además la posibilidad de cambiar entre la actualización de release actual y la actualización precedente en poco tiempo.
- Además de las actualizaciones de software de diagnóstico, también se ofrecen "a demanda" software de unidades de control e instrucciones de servicio digitales a través de den Retail Data Storage para XENTRY Diagnosis Pad | Pad 2.

Concepto de cable adaptador

Como ya se sabe, para casos de aplicación especiales dispone opcionalmente de cables adaptador que se pueden insertar en el cable OBD.

Indicación: en el XENTRY Diagnosis Kit 4 estos ya no se incluyen en el volumen de suministro. Sin embargo, puede utilizar los cables adaptadores de XENTRY Diagnosis Kit 3, ya que estos no se tienen que devolver con el fin del contrato.

Estructura esquemática para la integración en la red



- 1 Las actualizaciones de release, DVD Regio e instrucciones de servicio digitales estarán disponibles siempre online de forma actualizada.
- 2 En función de la configuración los datos se descargan por la noche.
- 3 El Retail Data Storage se integra en su red del taller, de tal forma que se encuentra en la misma red que su XENTRY Diagnosis Kit 4.
- 4 El XENTRY Diagnosis Pad | Pad 2 se integra en su infraestructura del taller (necesario para los servicios online)
- 5 La conexión entre XENTRY Diagnosis Pad 2 y la red del taller se puede realizar mediante LAN o WLAN.
- 6 XENTRY Diagnosis VCI (multiplexor) con forma constructiva pequeña y robusta sin núcleo de ordenador, sin batería, sin ventilador ni visualizador
- 7 El XENTRY Diagnosis Pad 2 se puede conectar al VCI mediante una conexión WiFi o mediante el cable de conexión USB.

2. Volumen de suministro del XENTRY Diagnosis Kit 4

El volumen de suministro de su XENTRY Diagnosis Kit 4 incluye lo siguiente:

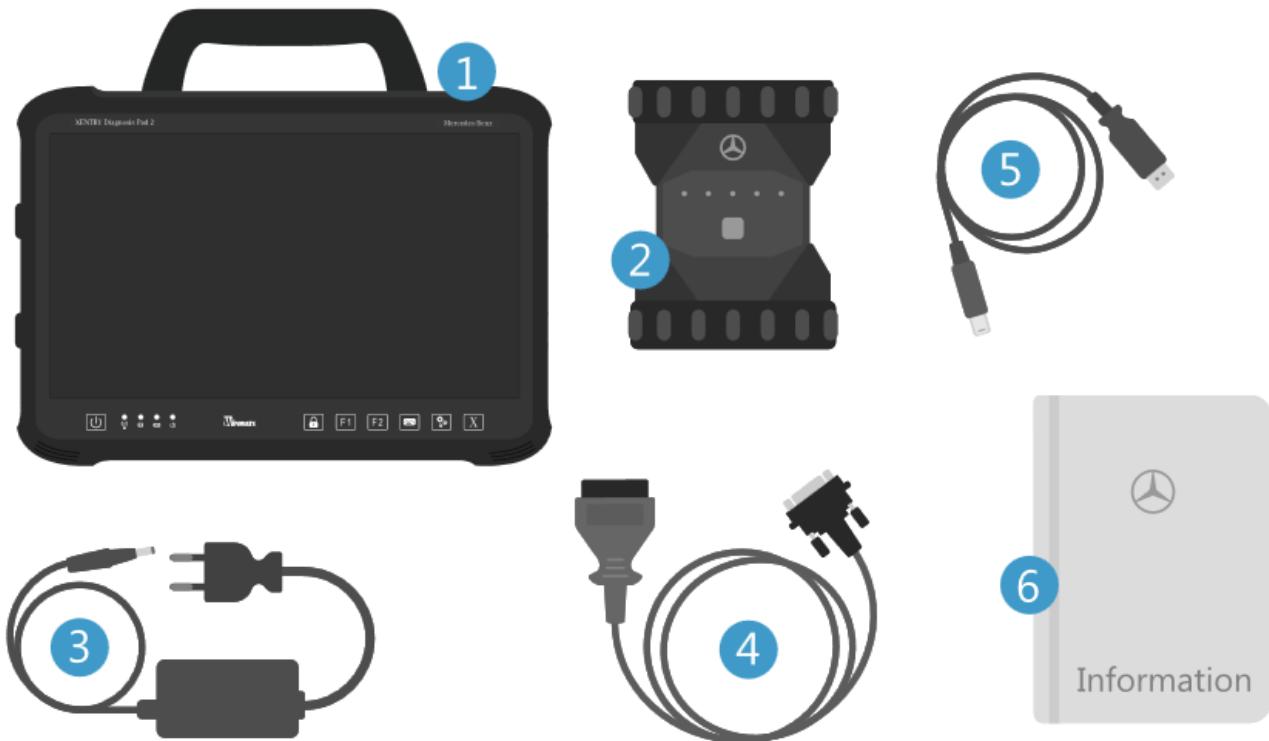


Ilustración 1: Volumen de suministro del XENTRY Diagnosis Kit 4

- 1 XENTRY Diagnosis Pad 2
- 2 XENTRY Diagnosis VCI
- 3 Fuente de alimentación con enchufe de red

- 4 Cable OBD (16 polos)
- 5 Cable de conexión USB (5 m)
- 6 Información para el usuario e indicaciones de seguridad

Como opción: técnica de medición XENTRY Scope

3. Primera puesta en servicio y configuración

Para la primera puesta en marcha del XENTRY Diagnosis Kit 4 este debe configurarse. Para ello, al encender por primera vez el XENTRY Diagnosis Pad 2 se inicia automáticamente el ConfigAssist.



Ilustración 2: Icono del ConfigAssist

De manera alternativa también puede abrir directamente el ConfigAssist mediante la siguiente ruta:
Escritorio > Diagnosis Toolbox > ConfigAssist

Navegue a través de ConfigAssist mediante el botón "Siguiente".

XENTRY Diagnosis Pad 2 dispone de dos teclas de función de libre ocupación: F1 y F2. Tiene la posibilidad de ocupar las teclas con las siguientes funciones:

- XENTRY Diagnosis AKT
- XENTRY CAN-Tool
- XENTRY Scope
- XENTRY Scope NVH
- Diagnosis Stop
- ConfigAssist
- VCI Manager
- Support Tool
- PDF Center
- XENTRY Portal
- Hot Topics

A continuación, haga clic en "Aplicar y continuar".

Después de otras informaciones a través de su XENTRY Diagnosis Kit 4 ahora puede enlazar XENTRY Diagnosis Pad 2 en su red.

3.1. Configurar la red

3.1.1.WLAN

En el campo "Redes disponibles", seleccione la WLAN que desee.

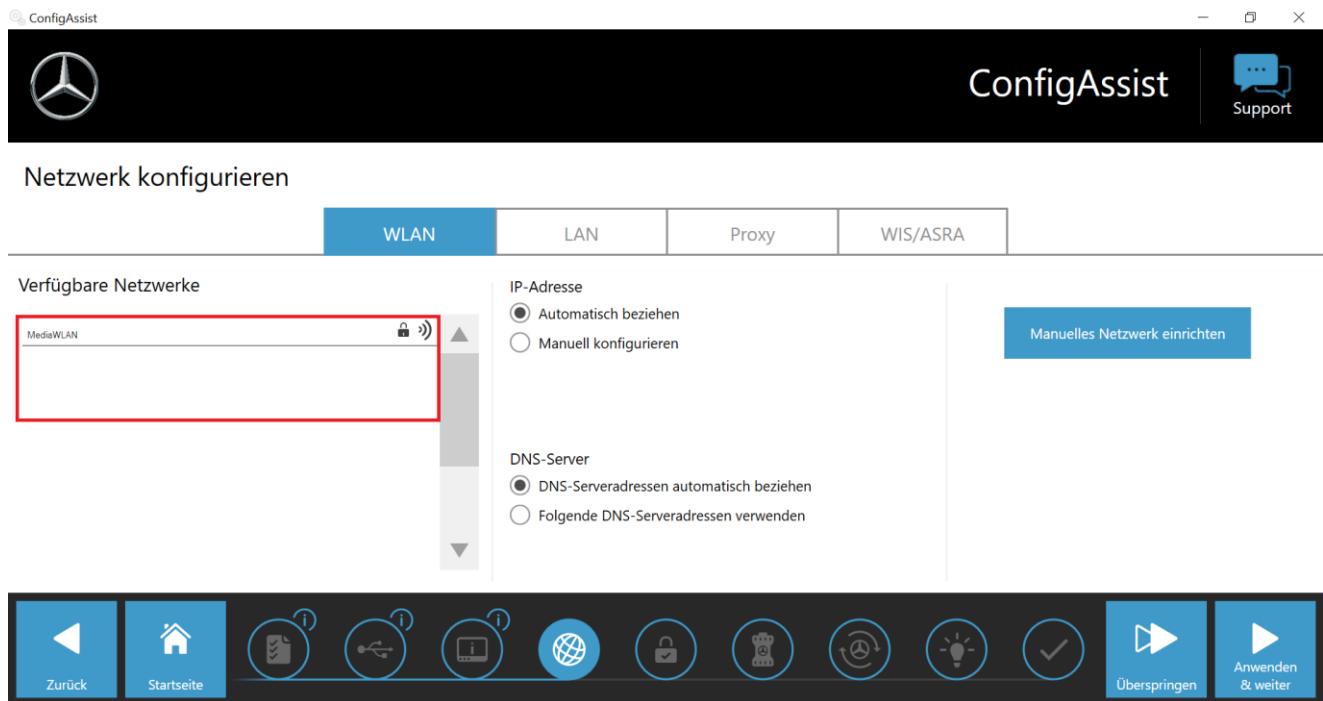


Ilustración 3: Configurar red WLAN

En la ventana que se abre a continuación, introduzca su clave de red y, seguidamente, haga clic en "Conectar".

En la lista "Redes disponibles" que aparece a continuación, se muestra ahora la indicación "Conectado" junto a la red que ha seleccionado.

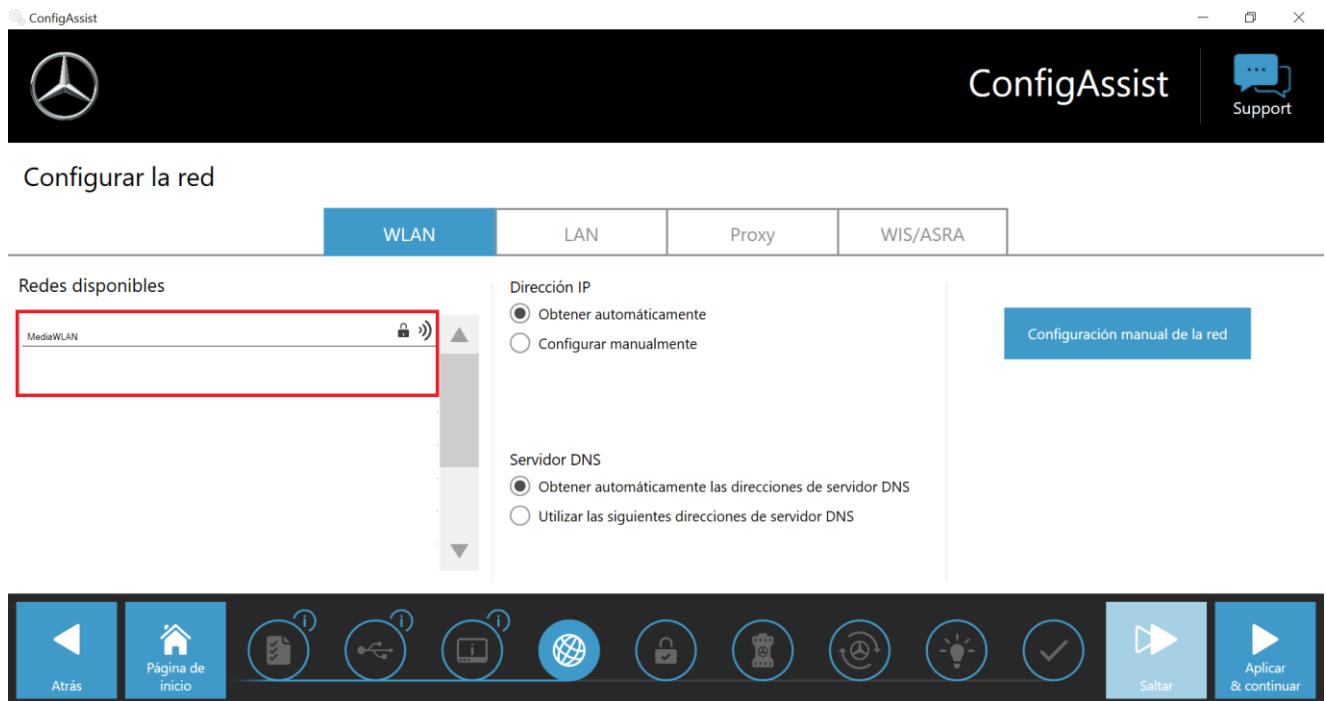


Ilustración 4: WLAN conectada

En este punto también tiene la posibilidad de configurar manualmente su dirección IP y de seleccionar otro servidor DNS.

De forma alternativa también puede configurar la red de forma manual. Para ello, haga clic en el botón "Configuración manual de la red".

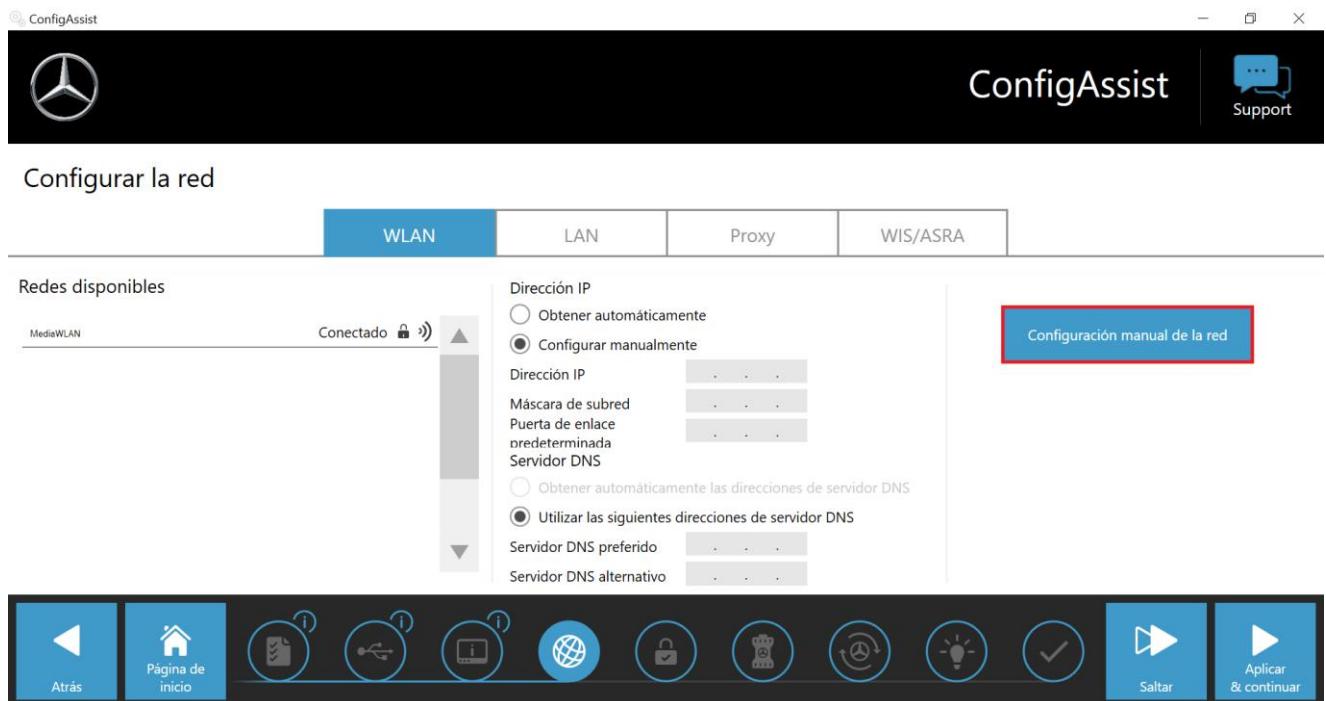


Ilustración 5: Configuración manual de la red

Introduzca aquí los datos correspondientes:

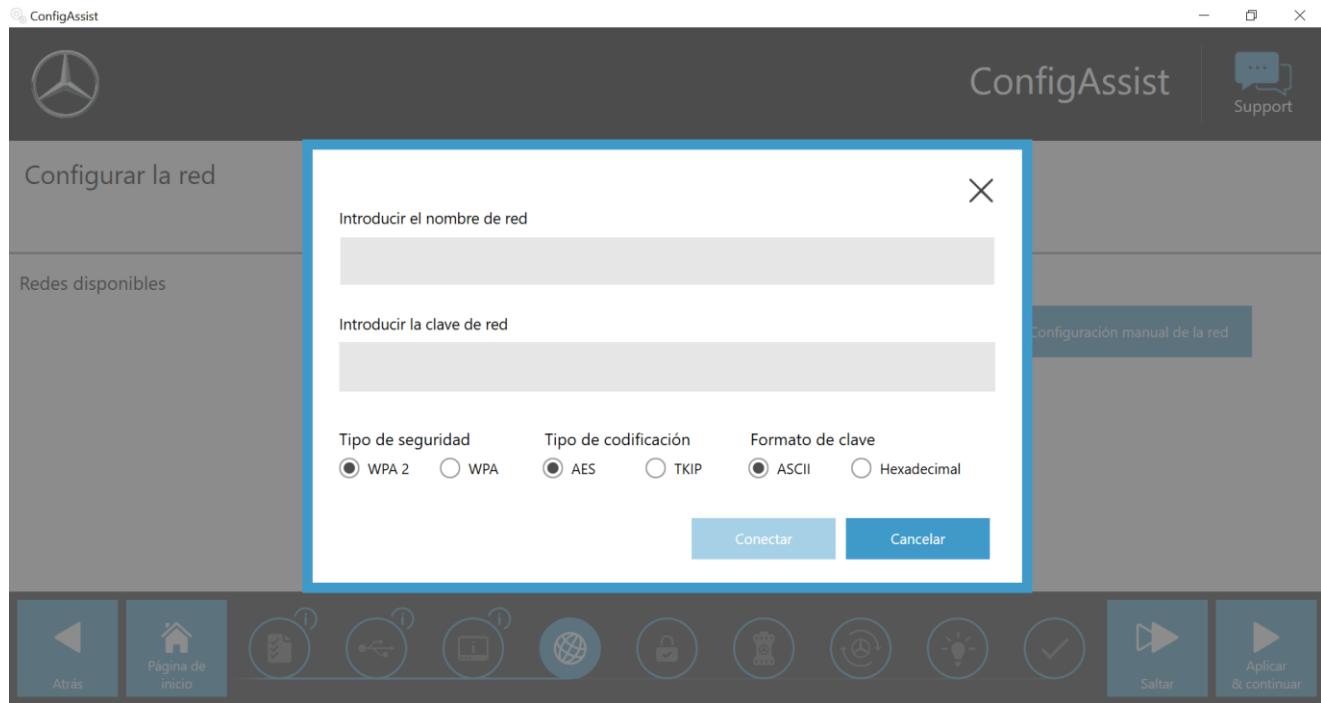


Ilustración 6: Introducir los datos de forma manual

Haga clic en "Aplicar y continuar".

3.1.2.LAN

Además de las configuraciones para WLAN también puede realizar configuraciones para la utilización del LAN. Puede obtener la dirección IP automáticamente o configurarla manualmente, así como configurar el servidor DNS.

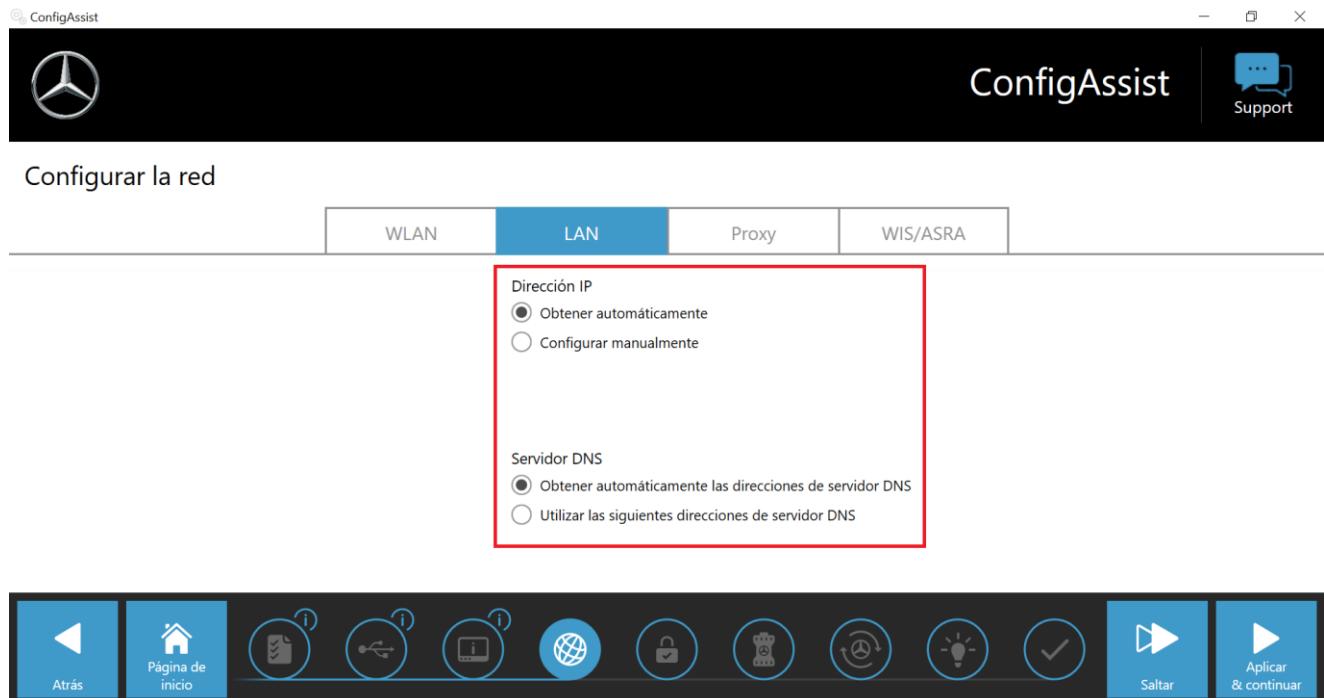


Ilustración 7: Configurar red WLAN

Haga clic en "Aplicar y continuar".

3.1.3.Proxy

En el área Proxy puede realizar algunas configuraciones para el servidor proxy.

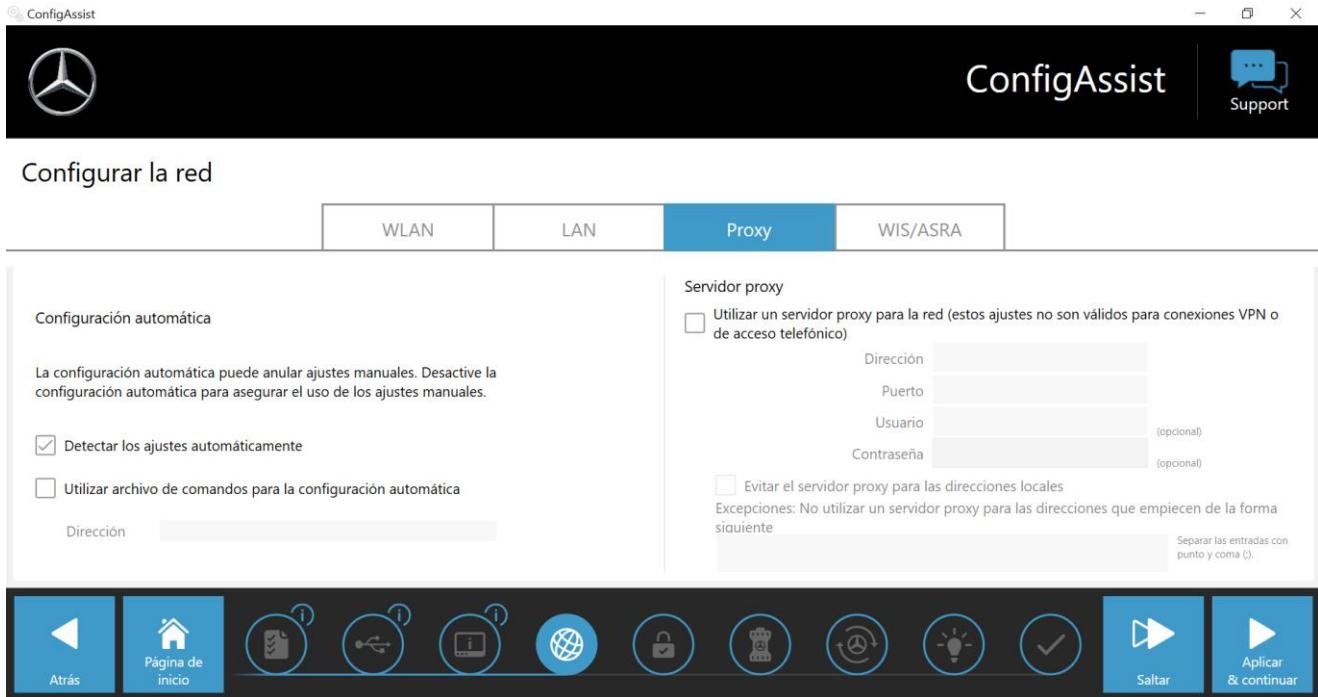


Ilustración 8: Configuración del proxy

Puede hacer que se detecten automáticamente las configuraciones para el servidor proxy o utilizar un archivo de comandos para la configuración automática. Aquí también puede realizar otras configuraciones para el servidor proxy.

Haga clic en "Aplicar y continuar".

3.1.4.WIS/ASRA

De manera estándar RetailFactory está preseleccionado como servidor WIS/ASRA. Sin embargo, en este punto tiene la posibilidad de configurar manualmente un servidor WIS/ASRA propio.

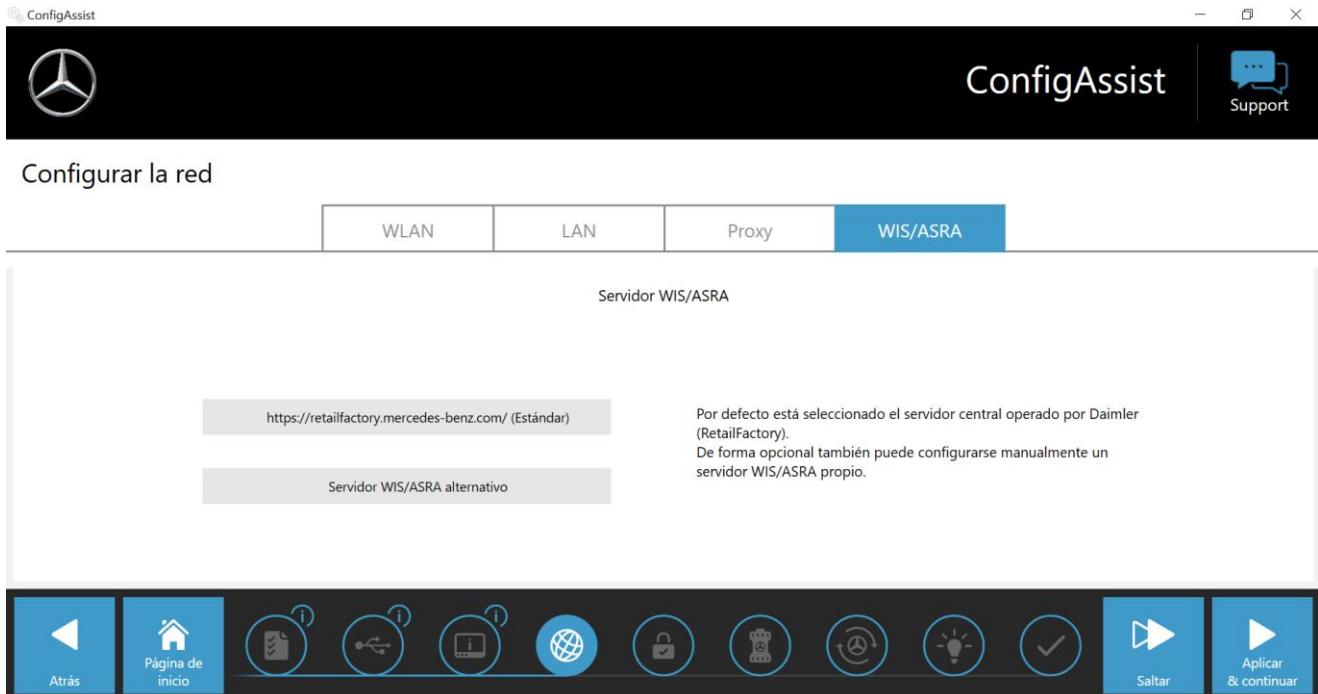


Ilustración 9: Servidor WIS/ASRA

3.3 Instalar StartKey

La comprobación de todos los datos introducidos dura unos breves momentos; su StartKey se solicitará durante este proceso. Esta se encuentra directamente online en el servidor StartKey y se solicita durante el proceso de instalación, siempre que la StartKey se hubiera pedido conjuntamente al realizar el pedido del XENTRY Diagnosis Kit 4.

Verá el número de sistema, el ID de hardware y la validez de su StartKey en la página que sigue ahora.

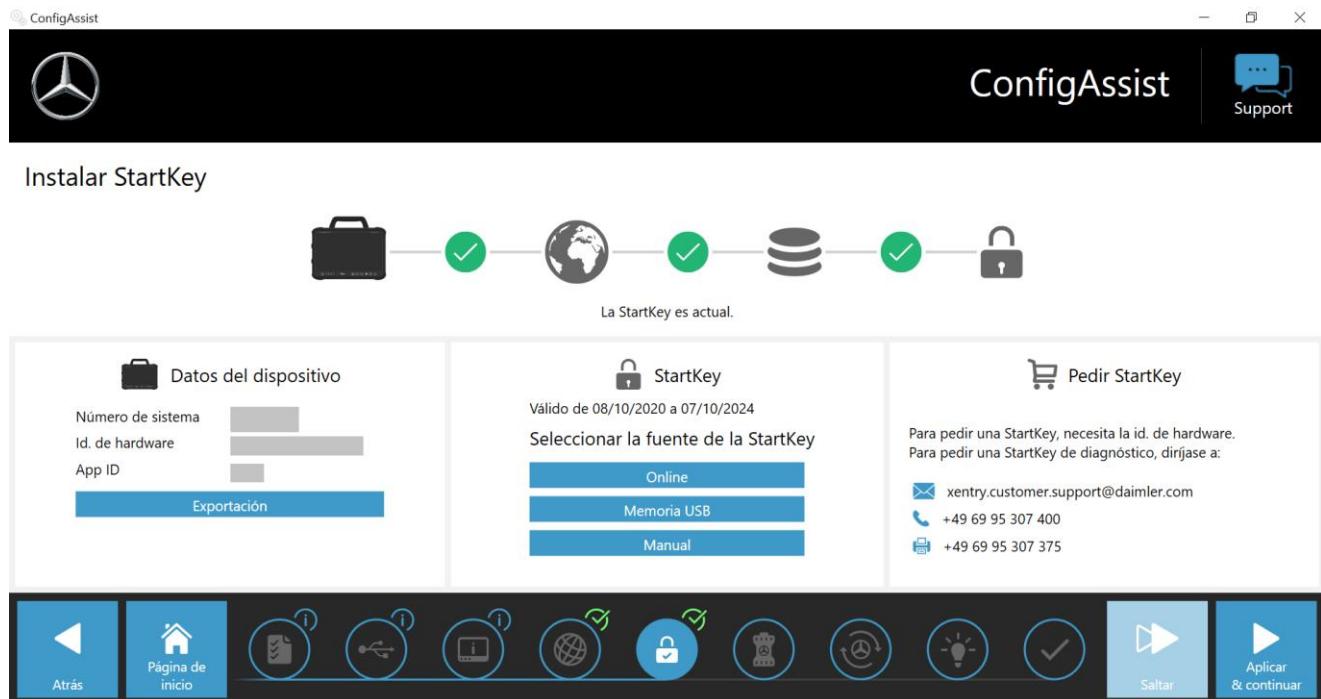


Ilustración 10: Vista de conjunto de la StartKey

Si no se ha cargado ninguna StartKey automáticamente en su XENTRY Diagnosis Pad 2, puede "solicitarla online", "instalarla con una memoria USB" o "introducirla manualmente". Si no tiene una StartKey, diríjase a su contacto para el pedido.

Para seleccionar una fuente de StartKey alternativa, proceda de la forma siguiente:

- Online: Haciendo clic en el botón "Online" se repite el proceso de descarga de internet de la StartKey.
- Memoria USB: Si la StartKey se encuentra en una memoria USB, seleccione esta opción. Si no se puede cargar automáticamente la StartKey desde la memoria USB, se abre a continuación el explorador. Allí navegue por su memoria USB hasta encontrar la StartKey.
- Manual: Así mismo, puede introducir manualmente la StartKey. Para ello, haga clic en "Manual" e introduzca allí la StartKey en la ventana que se abre.

3.2. Acoplamiento del XENTRY Diagnosis VCI

Conecte el XENTRY Diagnosis VCI al XENTRY Diagnosis Pad 2 con el cable de conexión USB, espere la señal acústica y a continuación, haga clic en "Acoplar VCI".

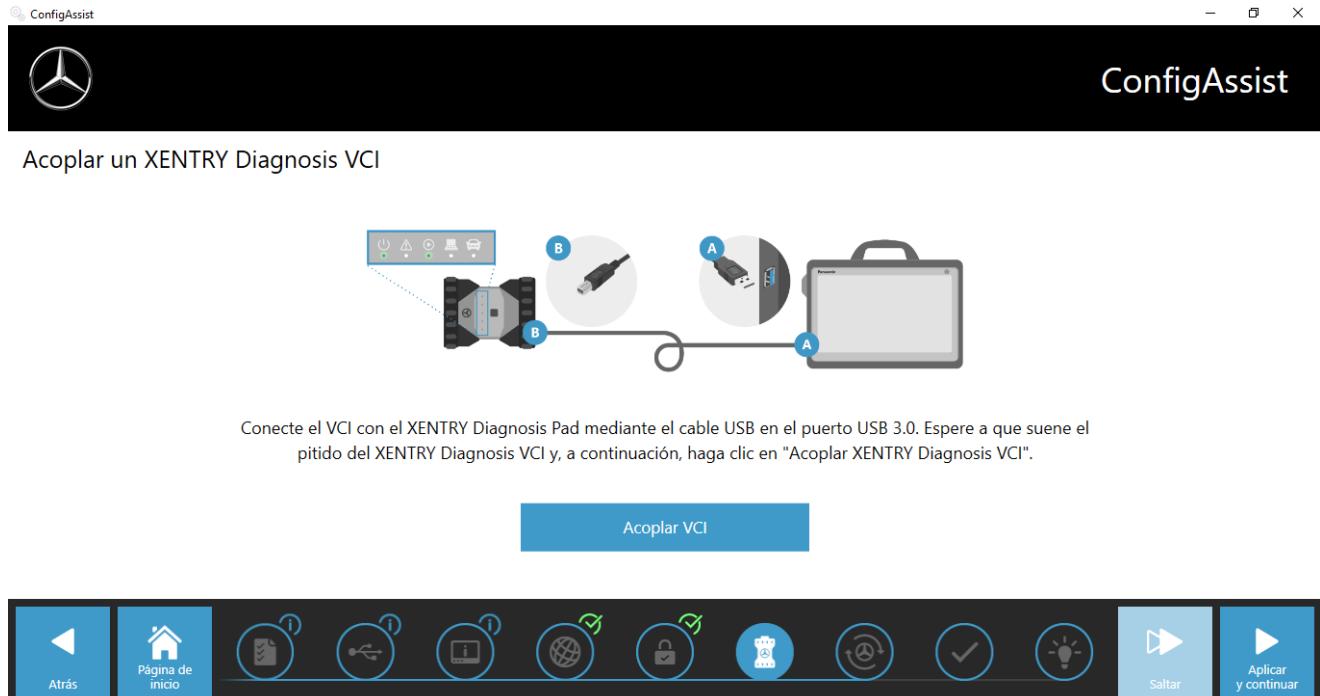


Ilustración 11: Acoplamiento del XENTRY Diagnosis VCI

⚠ Tenga en cuenta que solo puede estar acoplado exactamente un VCI con el XENTRY Diagnosis Pad 2. Al acoplar otro VCI, se le indicará que la configuración VCI actual se sobrescribirá.

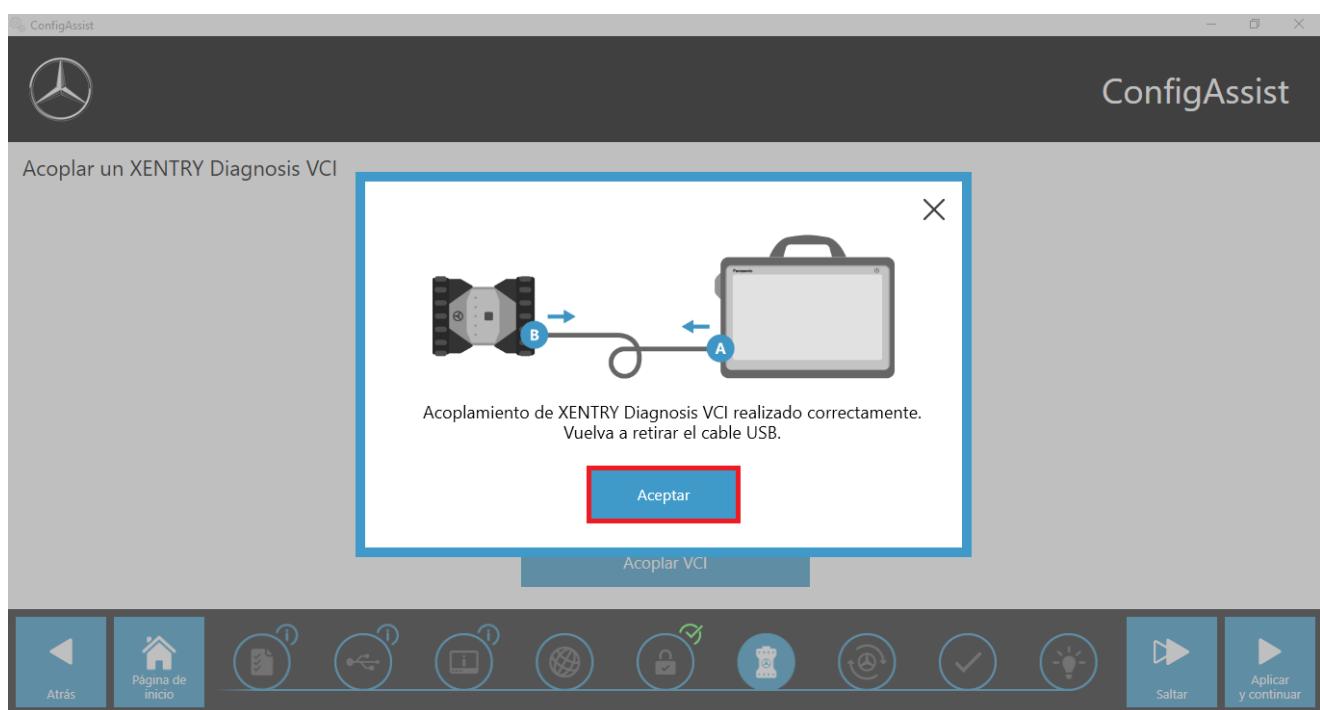


Ilustración 12: Acoplamiento correcto con el XENTRY Diagnosis VCI

En la siguiente pantalla, haga clic en "Aplicar y continuar".

3.3. Configuración del XENTRY Update Service

En este apartado puede usted configurar el XENTRY Update Service.

El XENTRY Update Service define cómo se deben descargar los datos de diagnóstico (actualización de release, DVD Regio e instrucciones de servicio digitales) a su XENTRY Diagnosis Kit 4.

Puede usted configurar el XENTRY Update Service de dos maneras:

Variante 1: XENTRY Update Service con Retail Data Storage

Los datos de diagnóstico (actualización del release, DVD Regio e instrucciones de servicio digitales) se descargan primero de internet al Retail Data Storage y después al XENTRY Diagnosis Pad | Pad 2.

Variante 2: XENTRY Update Service sin Retail Data Storage

Los datos de diagnóstico (actualización del release, DVD Regio e instrucciones de servicio digitales) se cargan directamente de internet al XENTRY Diagnosis Pad | Pad 2.

Tenga en cuenta: Retail Data Storage pertenece a los estándares de concesionario.

3.3.1. XENTRY Update Service con Retail Data Storage

Si su taller dispone de un Retail Data Storage, puede obtener las actualizaciones de diagnóstico, los DVD Regio y las instrucciones de servicio digitales (DiBA) a través del XENTRY Update Service desde internet.

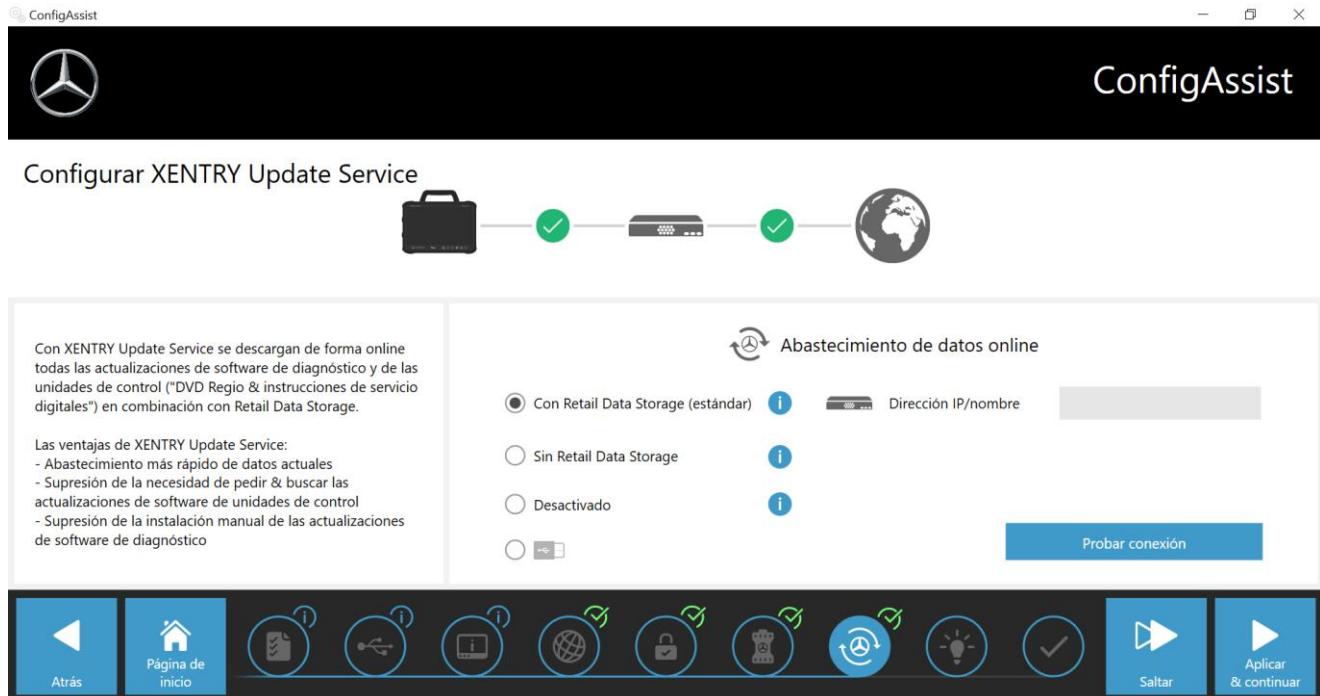


Ilustración 13: XENTRY Update Service con Retail Data Storage

Para crear la conexión con el Retail Data Storage, seleccione "**Con Retail Data Storage (estándar)**" e introduzca en el campo "Dirección IP / nombre" la dirección IP del Retail Data Storage que haya usted definido. A continuación, haga clic en el botón "Probar conexión"; la conexión correcta se confirmará con una marca de verificación verde.

Seleccione a continuación el punto "Aplicar y continuar".

3.3.2.XENTRY Update Service sin Retail Data Storage

Si su taller no dispone de un Retail Data Storage, puede realizar las actualizaciones del software de diagnóstico y de las unidades de control directamente de internet a su XENTRY Diagnosis Kit 4.

Tenga en cuenta que esta opción solo se recomienda para talleres con uno a dos equipos de diagnóstico. En comparación con XENTRY Update Service con Retail Data Storage surgen las siguientes restricciones:

- Mayor carga de red
 - Los datos, especialmente el software de unidades de control, se deben descargar de internet a petición, con el concesionario en funcionamiento (en comparación con Retail Data Storage: descarga por la noche).
 - Se requiere de una descarga múltiple de los datos
 - Elevado volumen de datos requerido para la conexión a internet
- Mayores tiempos de espera para los clientes finales, en función de la duración de la descarga

Para esta opción, en el área "Retail Data Storage" seleccione el botón "**Sin Retail Data Storage**" y, a continuación, haga clic en "Probar conexión".

Indicación: en caso de una avería del Retail Data Storage, también tiene la posibilidad de ajustar en cualquier momento esta opción en su XENTRY Diagnosis Kit 4.

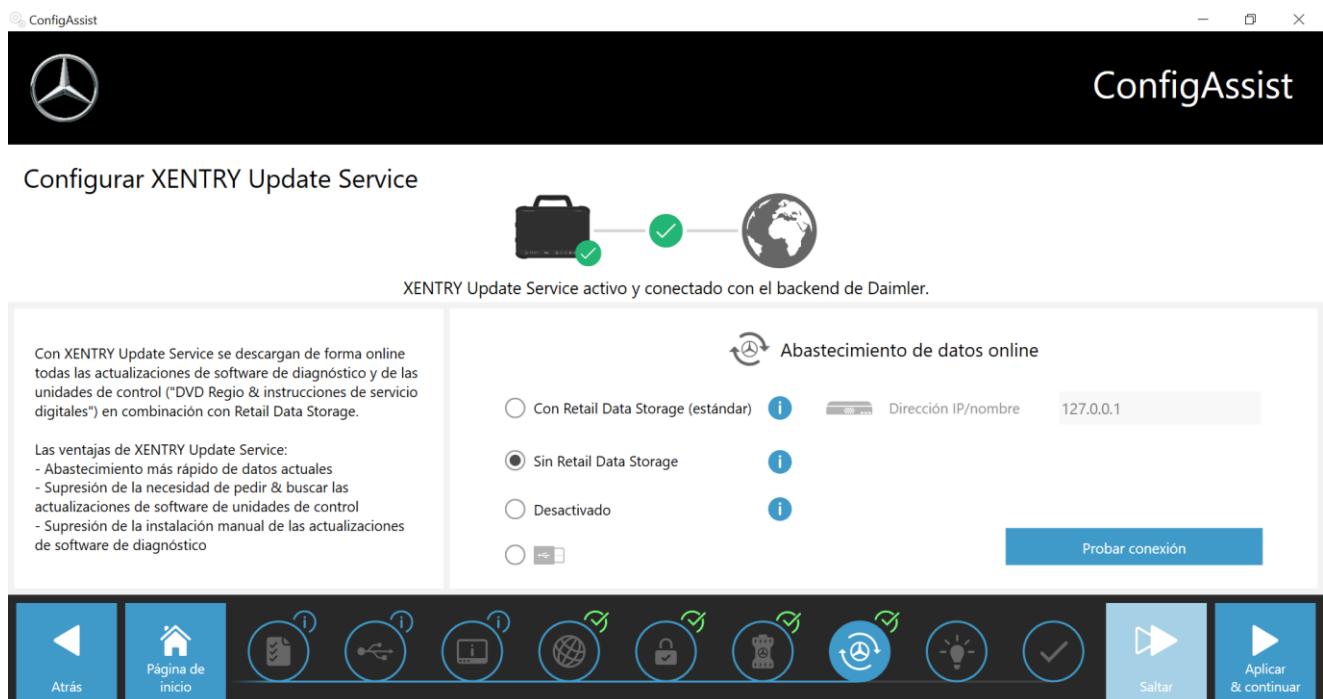


Ilustración 14: XENTRY Update Service sin Retail Data Storage

Haga clic en "Aplicar y continuar".

3.4. Finalización de la configuración

En la página "Información detallada" se muestran enlaces que contienen información útil adicional.

Haga clic en el botón "Siguiente". Se muestra una relación de la configuración del sistema.

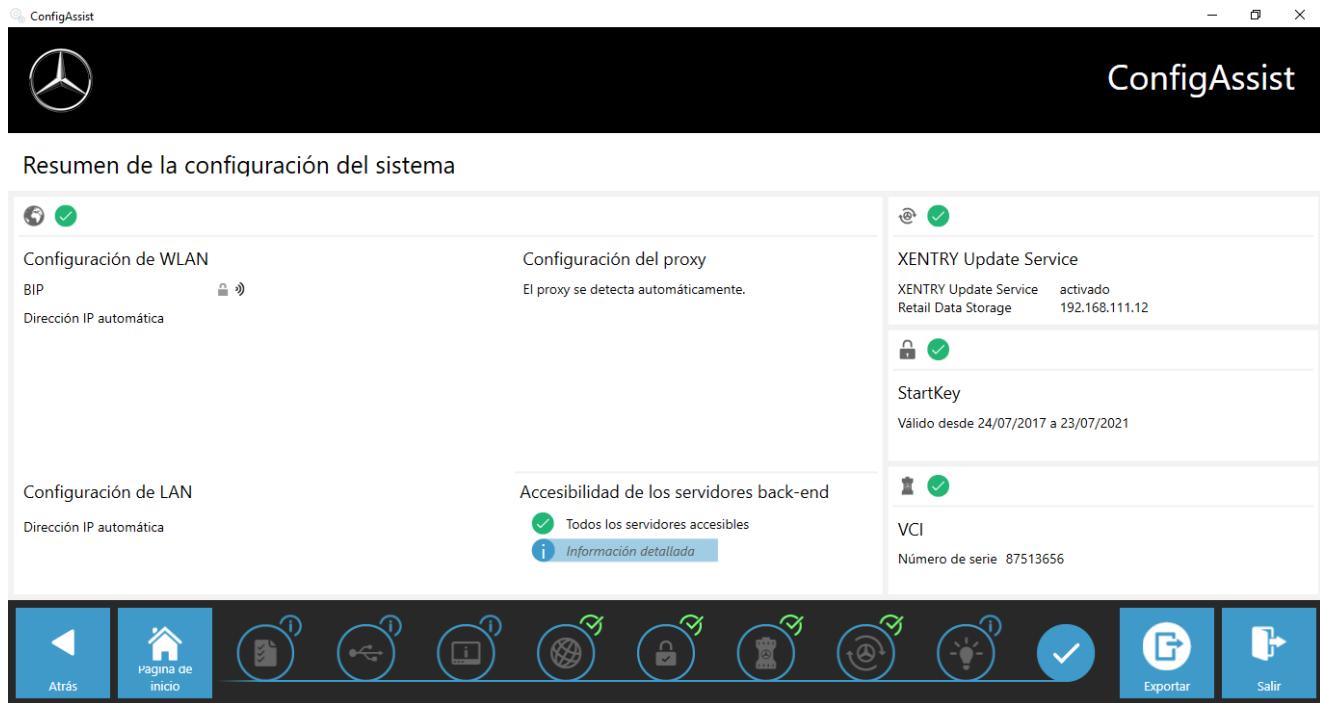


Ilustración 15: Relación de la configuración del sistema

Una "marca de verificación" verde junto a la bola del mundo indica una correcta conexión online. Sin embargo, si el símbolo aparece en gris, significa que no se ha establecido ninguna conexión online. Compruebe en ese caso su configuración de red. Usted también recibe información sobre la configuración de red, XENTRY Update Service, StartKey y el XENTRY Diagnosis VCI acoplado.

3.5. Exportación de la configuración

Con la función "Exportar" puede guardar su configuración en un archivo *.XML en el disco duro del XENTRY Diagnosis Pad 2. Si en su empresa utiliza varios sistemas de diagnóstico XENTRY, entonces tiene la posibilidad de instalar la configuración en cada XENTRY Diagnosis Pad | Pad 2 con ayuda de una memoria USB o a través de la red.

Esta función de exportación se encuentra en la primera y en la última página del ConfigAssist.

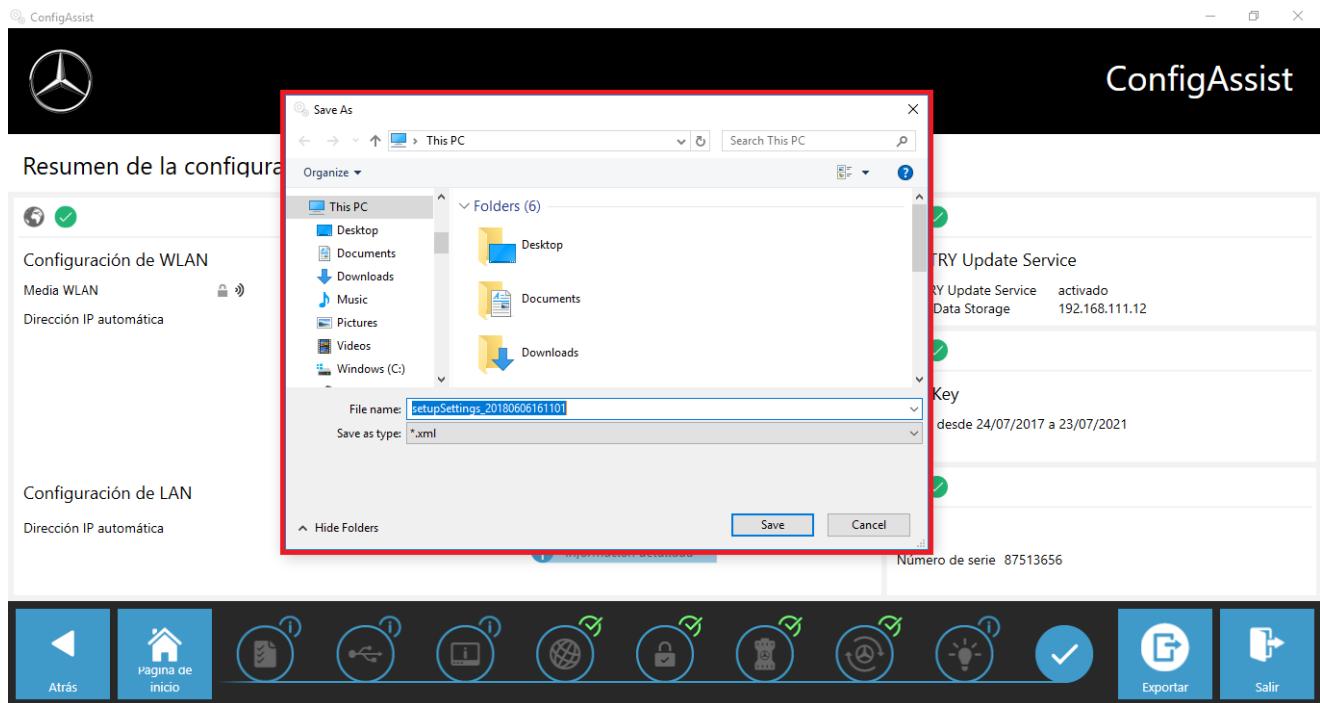


Ilustración 16: Exportación de la configuración

Ha configurado su XENTRY Diagnosis Pad 2 correctamente.
Finalice ahora el ConfigAssist haciendo clic en "Salir".

3.6. Instalación, actualización y configuración de WIS/ASRA offline/Standalone

Desde abril de 2021 comienza la migración del proceso de distribución actual del disco físico de Blu-ray a la instalación mediante el portal de descarga WIS. Se consigue así un gran número de ventajas y valores añadidos con respecto a la instalación actual mediante disco Blu-ray:

- Supresión del proceso de pedido mediante la logística de repuestos
- Sin tiempos de retraso ocasionados por el envío
- Acceso mediante registro único en XENTRY Portal / After Sales Portal
- Los paquetes de instalación están disponibles inmediatamente tras la publicación
- La consulta de datos y la instalación son posibles directamente en XENTRY Diagnosis Kit 3 | Kit 4
- Subsanación de errores de efecto inmediato; supresión de errores de lectura en soportes de datos físicos
- Se suprime la distribución interna mediante la autorización de varios abonados
- Ya no es necesario ningún archivado de medios físicos
- Contribución a la protección del medio ambiente y sostenibilidad

3.6.1. Instalación/Actualización de WIS/ASRA offline/Standalone

Si es necesario, y en casos excepcionales justificados, tiene la posibilidad de instalar de forma local WIS/ASRA en su XENTRY Diagnosis Pad | Pad 2.

Para la instalación y actualización del software WIS/ASRA (offline) es necesario el acceso a XENTRY Portal / After Sales Portal.; el pedido de la versión completa de disco Blu-ray solo será posible durante el año 2021.

1. Antes de ejecutar la instalación de WIS/ASRA offline/Standalone, pida una StartKey para WIS/ASRA a través de los canales habituales (XENTRY Shop).

Indicación

Tenga en cuenta que la instalación local de WIS/ASRA en el XENTRY Diagnosis Pad | Pad 2 solo es posible en casos excepcionales justificados. Por eso, al pedir una StartKey a través de XENTRY Shop debe indicarse una justificación. El ID de hardware (HW-ID) necesario durante el proceso de pedido se puede consultar en ConfigAssist.

2. Conecte el XENTRY Diagnosis Pad | Pad 2 a la corriente con la fuente de alimentación suministrada.
3. Encienda el XENTRY Diagnosis Pad | Pad 2.

Instalación mediante el portal de descarga WIS/ASRA

1. Abra el XENTRY Portal / After Sales Portal con el navegador (<https://xentry.mercedes-benz.com/>)
2. Abra el área de descarga de WIS/ASRA mediante la ficha "Descargas WIS/ASRA"



3. Haga clic en la versión más actual de la publicación y cárguela directamente en XENTRY Diagnosis Pad | Pad 2.

Indicación

Tenga en cuenta que la descarga de los archivos de instalación puede durar hasta 3 horas en función de la conexión de red. Recomendamos realizar la descarga durante la noche. No intente interrumpir el proceso de descarga y espere hasta que se confirme que la descarga se ha completado.

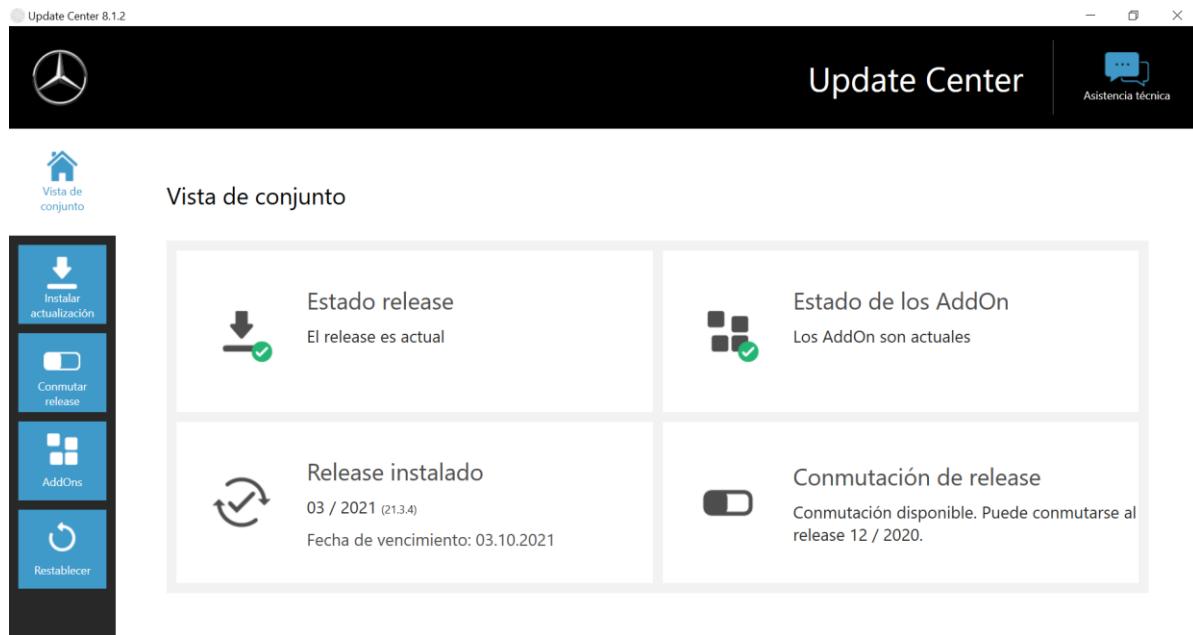
- Después de finalizar la descarga, hacer doble clic y descomprimir el archivo ISO

Instalación mediante Blu-ray

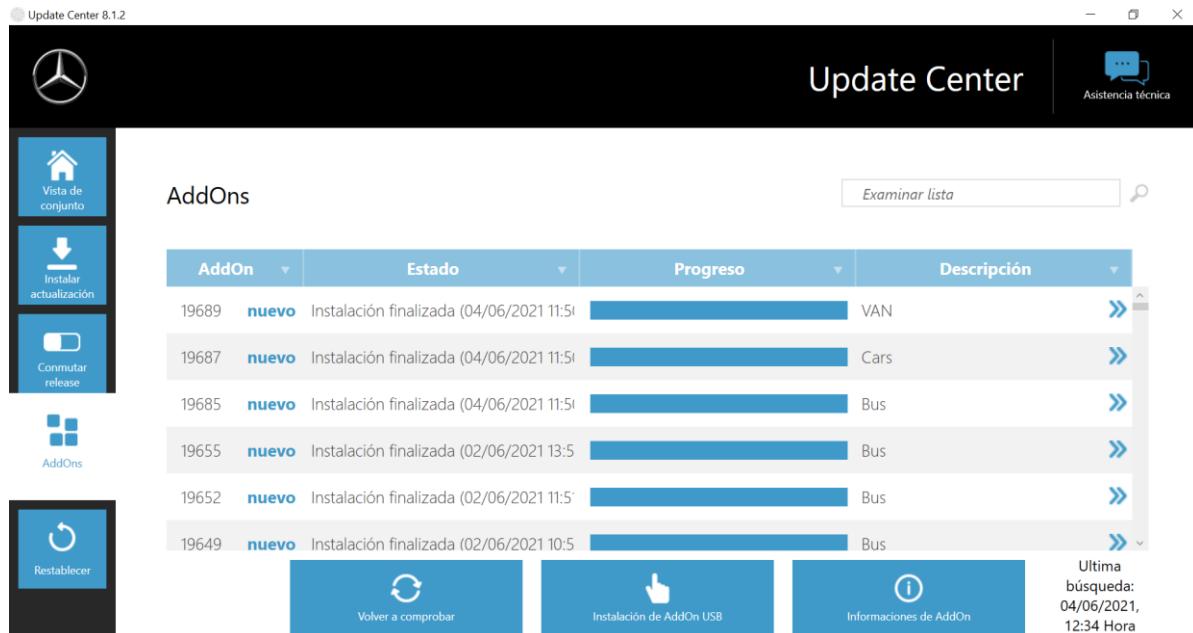
- Conecte la unidad de disco Blu-ray con el cable de conexión USB a XENTRY Diagnosis Pad | Pad 2.
- Introduzca el disco Blu-ray WIS/ASRA en la unidad de disco Blu-ray.

Solo una sola vez desde la versión de abril de 2021

- Abra el Update Center.



- Haga clic en "AddOns" en el panel izquierdo de navegación
- Haga clic en "Instalación USB AddOn" y abra el archivo AddOn (*16000_V1.addon) en el nivel superior del paquete de instalación de WIS/ASRA dentro de la vista del explorador. Se instala el AddOn.



En cada actualización de la versión completa

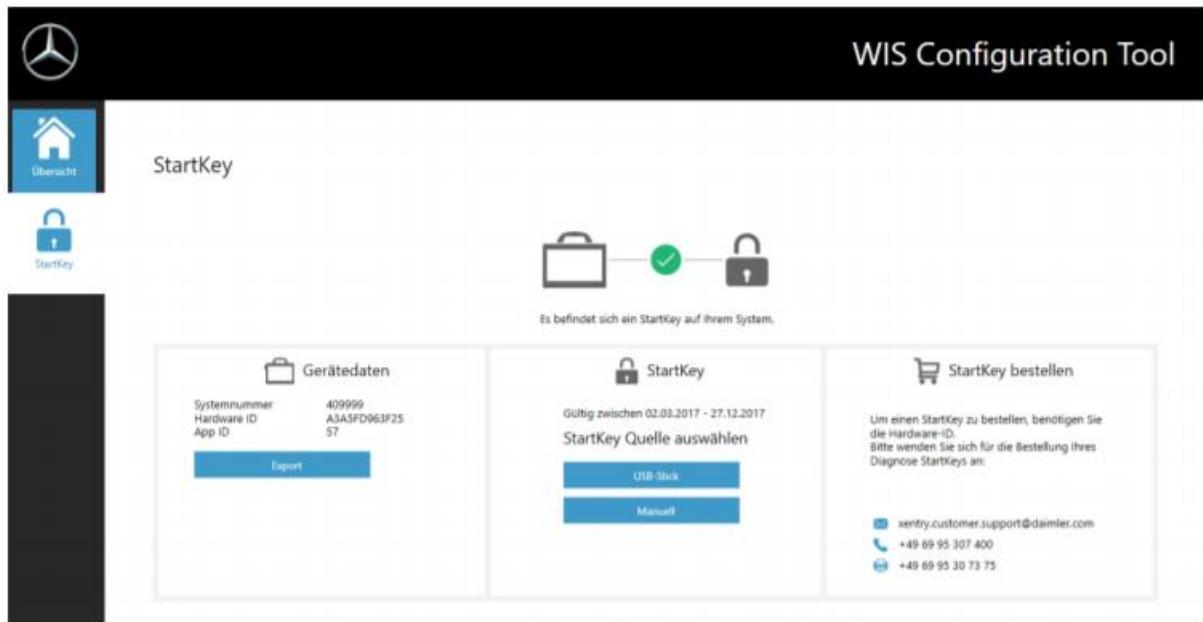
1. Inicie la instalación haciendo doble clic en el archivo *WISStandaloneSetup.exe* en la ruta *ewa\xd_pad*
2. Siga el resto de instrucciones de la rutina de instalación.
3. Después de la instalación de WIS/ASRA offline, se accede directamente a la WIS Configuration Tool.

3.6.2. Introducción de la StartKey WIS/ASRA en la WIS Configuration Tool

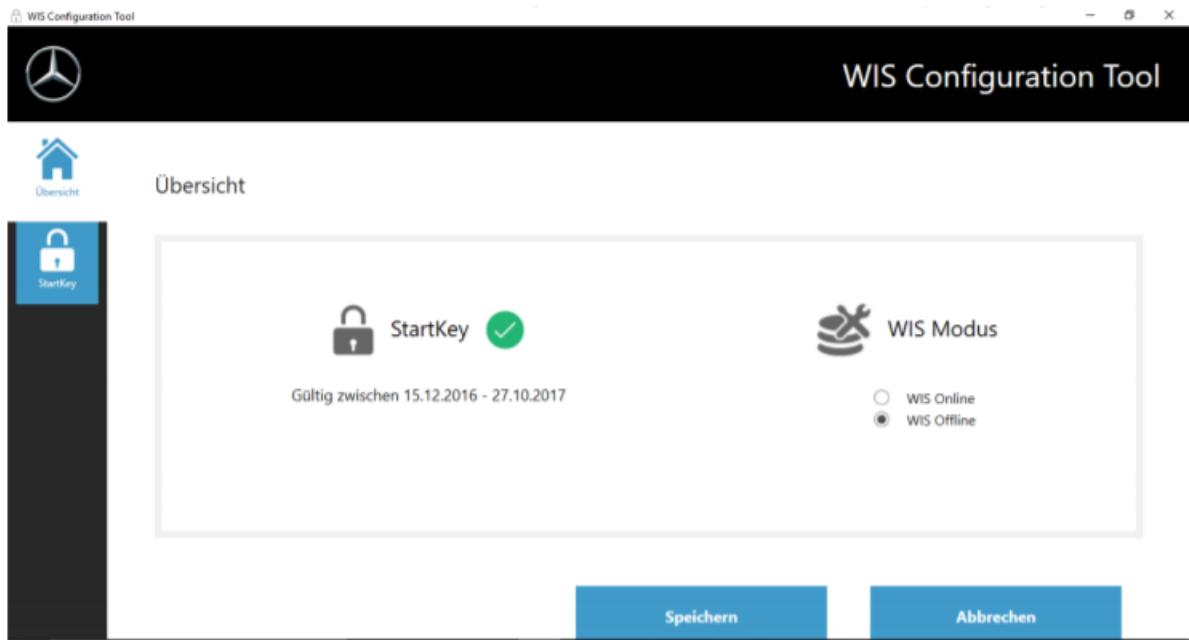
Después de la primera instalación de WIS/ASRA offline/Standalone realice los siguientes pasos sucesivamente.

Tenga en cuenta: El requisito para la instalación de WIS/ASRA offline es que se le haya enviado por correo electrónico la StartKey en formato de archivo de texto (*.txt). Puede guardar este archivo en una memoria USB y conectar la memoria USB más adelante en el XENTRY Diagnosis Pad | Pad 2.

1. Abra la WIS Configuration Tool (en la opción de menú Mercedes-Benz) dentro del menú de inicio después de recibir la StartKey.
2. Seleccione en el lado izquierdo el botón "StartKey" y haga clic a continuación en el botón "Memoria USB" para instalar la StartKey mediante la memoria USB. Como alternativa puede introducir manualmente la StartKey haciendo clic en el botón "Manual".



3. Haga clic en la opción de menú "Vista de conjunto" en WIS Offline como aplicación preferida. Después de la configuración, podrá iniciar WIS/ASRA offline a través del ícono del escritorio o acceder desde XENTRY. En esta ventana también se muestra el periodo de validez de su WIS/ASRA StartKey.



4. A continuación, haga clic en "Guardar".

4. Funcionamiento del XENTRY Diagnosis Kit 4

4.1. Inicio del sistema

Proceda como se describe en los siguientes pasos para iniciar correctamente los componentes de su XENTRY Diagnosis Kit 4:

1. Inicie el XENTRY Diagnosis Pad 2 pulsando durante aprox. 5 segundos el botón situado en la parte delantera del equipo.



Ilustración 17: Ilustración del XENTRY Diagnosis Pad 2

2. Inicie el XENTRY Diagnosis VCI enchufándolo a un vehículo mediante el cable OBD (y, dado el caso, con un adaptador de cable).
3. Una vez haya arrancado el VCI, se emite una señal acústica (pasados unos 10 segundos).
4. Inicie el XENTRY Diagnosis Software para iniciar una sesión de diagnóstico.

4.2. Opciones de conexión

La conexión con la red de taller, el XENTRY Diagnosis Pad 2 y el XENTRY Diagnosis VCI puede elegirse individualmente.

Variante de conexión 1: WLAN



Ilustración 18: Variante de conexión 1: WLAN

Variante de conexión 2: WLAN y USB



Ilustración 19: Variante de conexión 2: WLAN y USB

Variante de conexión 3: LAN y WLAN



Ilustración 20: Variante de conexión 3: LAN y WLAN

Variante de conexión 4: LAN y USB



Ilustración 21: Variante de conexión 4: LAN y USB

4.3. Update Center

Las actualizaciones se controlan a través del Update Center. Puede abrirlo desde el ícono "Update Center" en la barra de tareas de su XENTRY Diagnosis Pad 2:



Ilustración 22: Ícono del Update Center

La vista de conjunto del Update Center le muestra todos los datos relevantes de un vistazo con respecto a las actualizaciones de diagnóstico y AddOns.

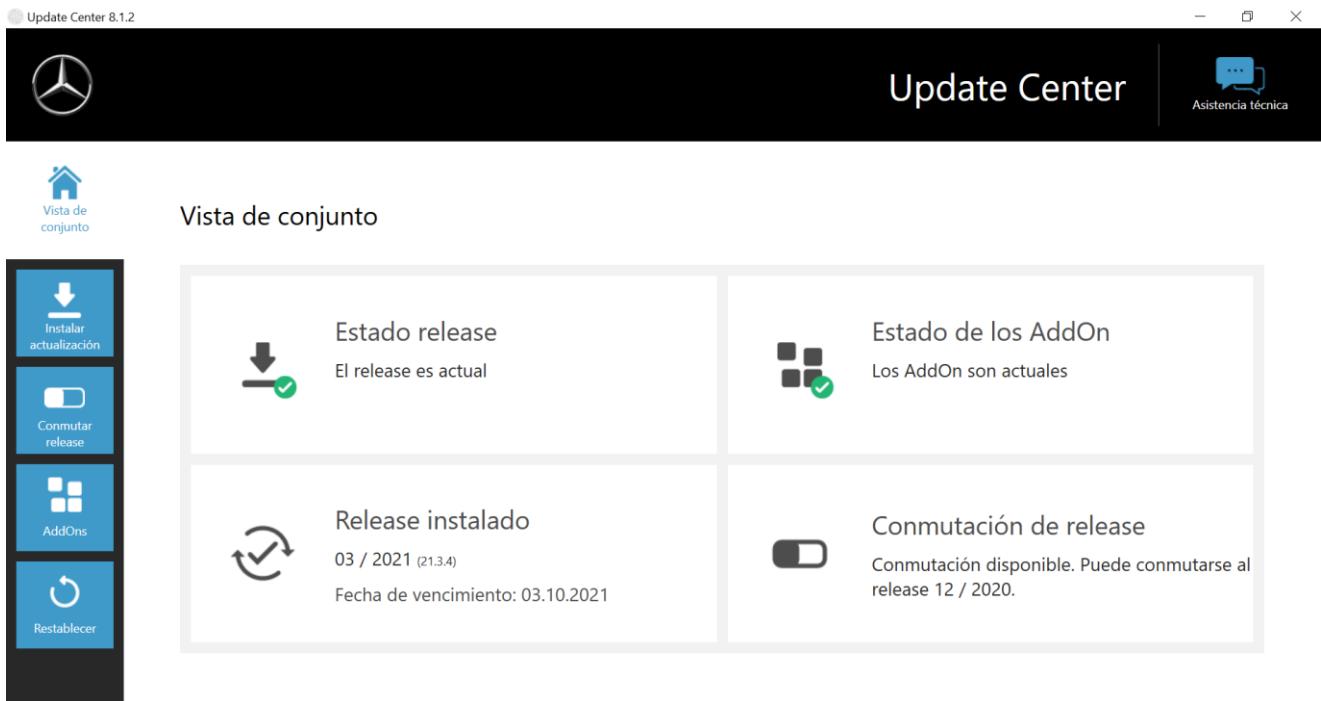


Ilustración 23: Pantalla de inicio del Update Center

4.4. Conmutar release

La conmutación de release está integrada en el centro de actualizaciones y le ofrece la posibilidad de restablecer la actualización de release ya instalada previamente.

El disco duro del XENTRY Diagnosis Pad | Pad 2 cuenta con dos particiones.

Si en un caso excepcional fuese necesario volver a la actualización de software precedente después de haber instalado una actualización, haga clic en el botón "Comutar release" en el panel izquierdo de navegación y allí haga clic en "Switch (conmutar)".

Este proceso no suele durar más de diez minutos.

Después de una conmutación, mediante este botón puede volver a la actualización de software actual.

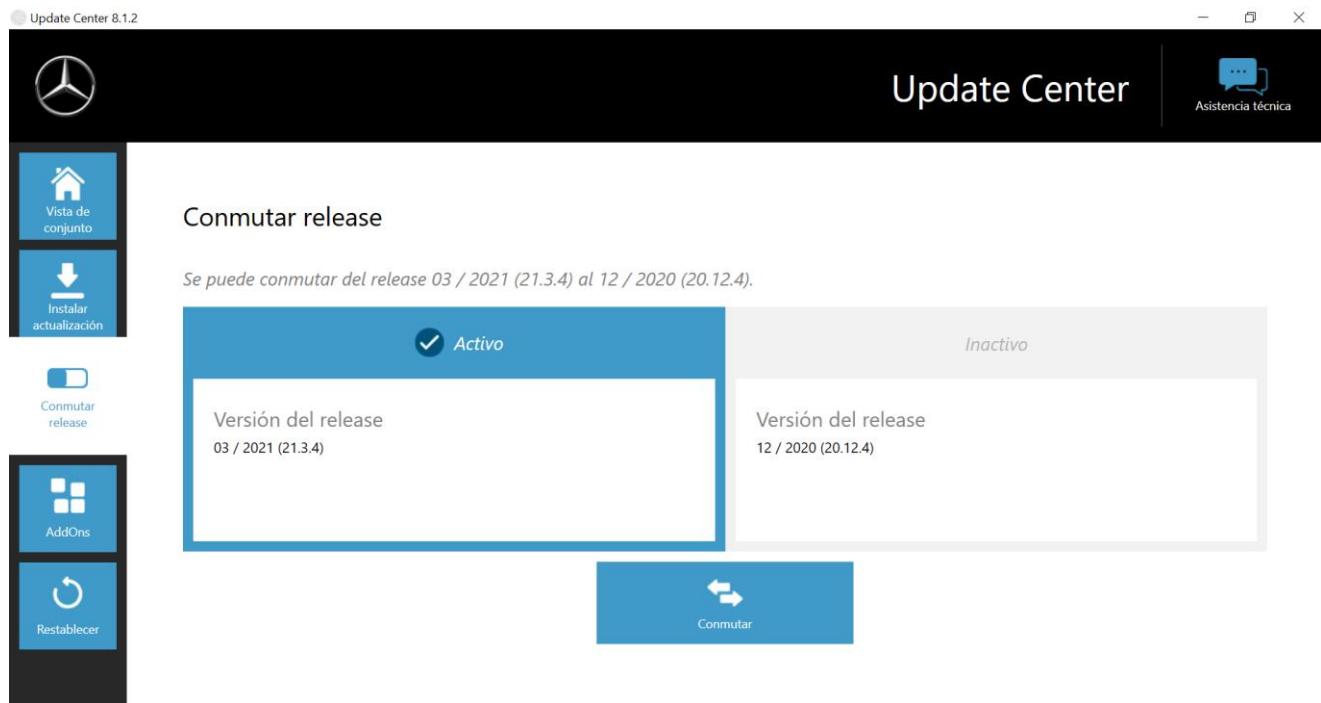


Ilustración 24: Comutación de releases en el Update Center

⚠️ Tenga en cuenta que no podrá conmutar el release hasta que no haya instalado dos actualizaciones de release.

4.5. AddOns

Los AddOns se instalan automáticamente en el XENTRY Diagnosis Pad 2. Esto se regula mediante el centro de actualizaciones (Update Center). Para comprobar el estado actual de los AddOns instalados, abra el Update Center.

Con un clic en la opción de menú "AddOns" recibirá una relación de los AddOns instalados actualmente.

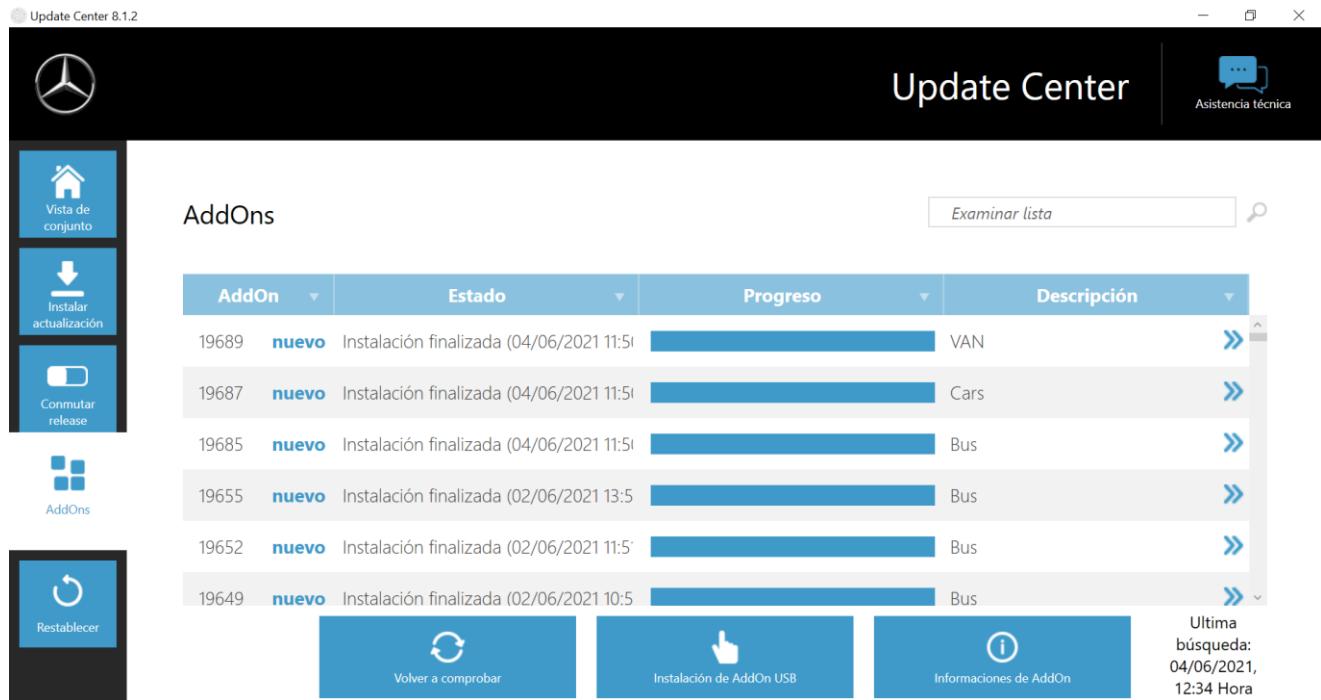


Ilustración 25: AddOns instalados

En el capítulo 7.2 de la página 63 encontrará más información sobre el Update Center.

Básicamente, el Update Center comprueba de manera continua si hay nuevos AddOns disponibles. Puede iniciar esta comprobación usted mismo con el botón "Comprobar de nuevo".

Si un empleado de soporte le envía un AddOn por correo electrónico, lo puede copiar en una memoria USB y cargarlo e instalarlo por su cuenta en el XENTRY Diagnosis Pad 2 desde la opción "Instalación USB AddOn".

4.6. Impresoras e impresión

En el XENTRY Diagnosis Pad 2 puede instalarse cualquier impresora convencional compatible con Windows 10. Esto es aplicable tanto a impresoras USB como a impresoras de red. Preferentemente se deben usar impresoras certificadas para Windows 10. La instalación ya no se efectúa mediante herramientas especiales, sino simplemente desde el menú de Windows.

4.6.1. Instalación de una impresora USB

Para instalar una impresora USB, proceda del siguiente modo:

1. Encienda la impresora USB
2. Conecte la impresora USB con el XENTRY Diagnosis Pad 2 mediante un cable de conexión USB adecuado.
3. Espere unos minutos.
4. Microsoft Windows 10 instala automáticamente la impresora USB.
5. La impresora está ahora operativa.

Como alternativa, puede realizar la instalación de la siguiente forma:

1. Abra el panel de control desde el menú principal.

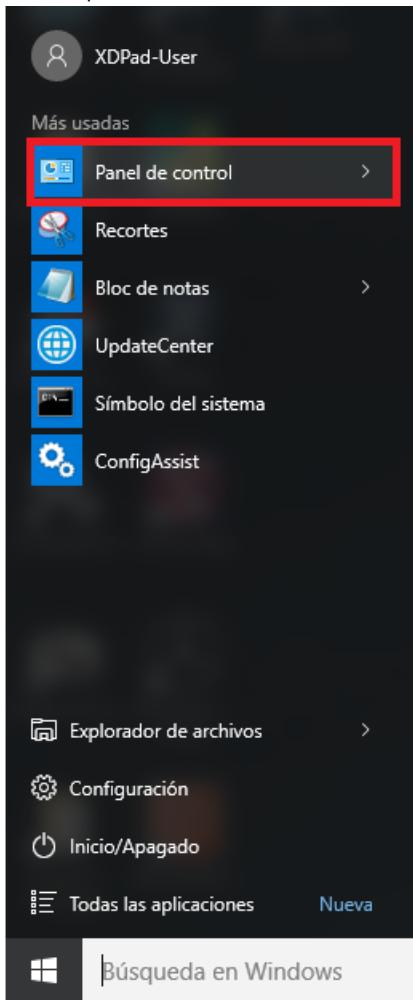


Ilustración 26: Abrir el panel de control

2. En el área "Hardware y sonido", haga clic en la opción "Ver dispositivos e impresoras".

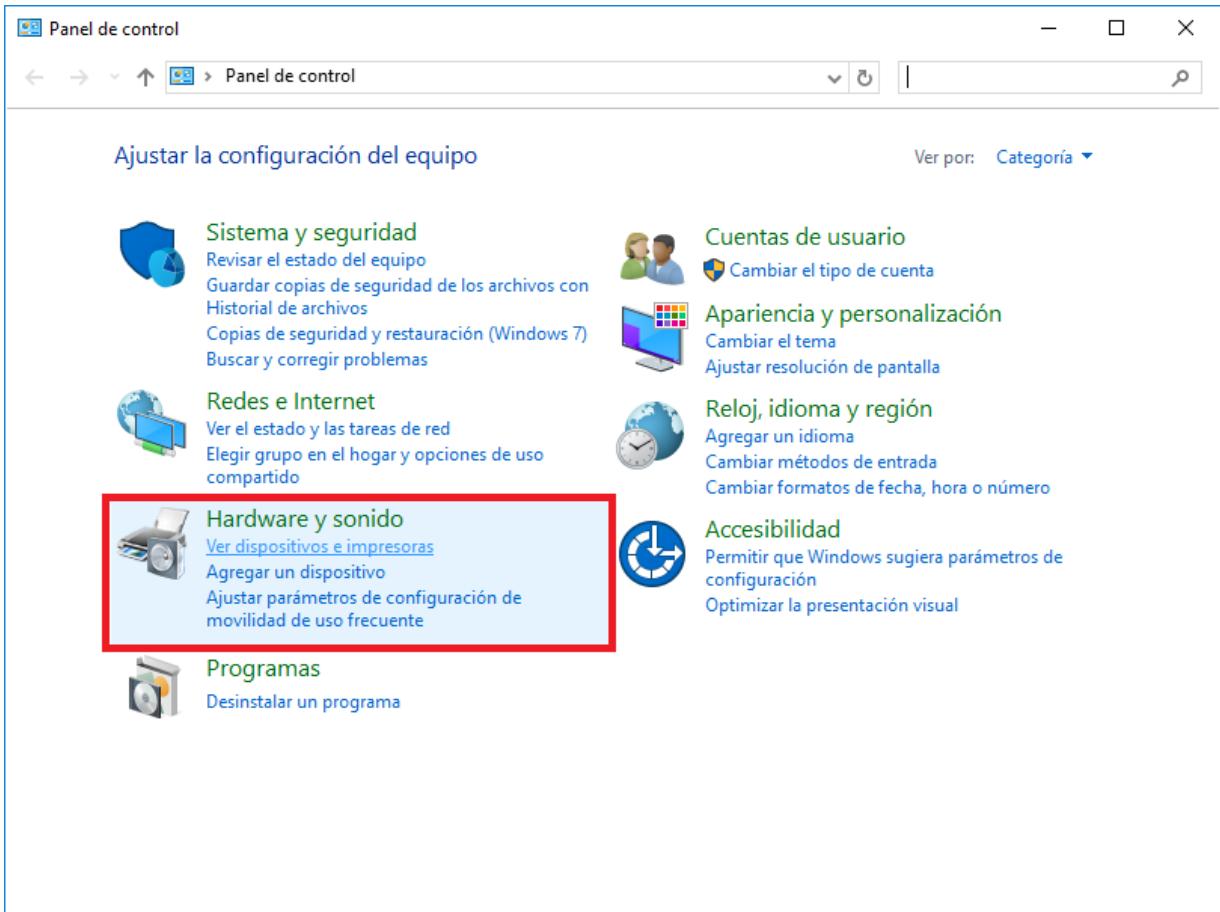


Ilustración 27: Hardware y sonido – Ver dispositivos e impresoras

3. Allí se muestran las impresoras instaladas actualmente:

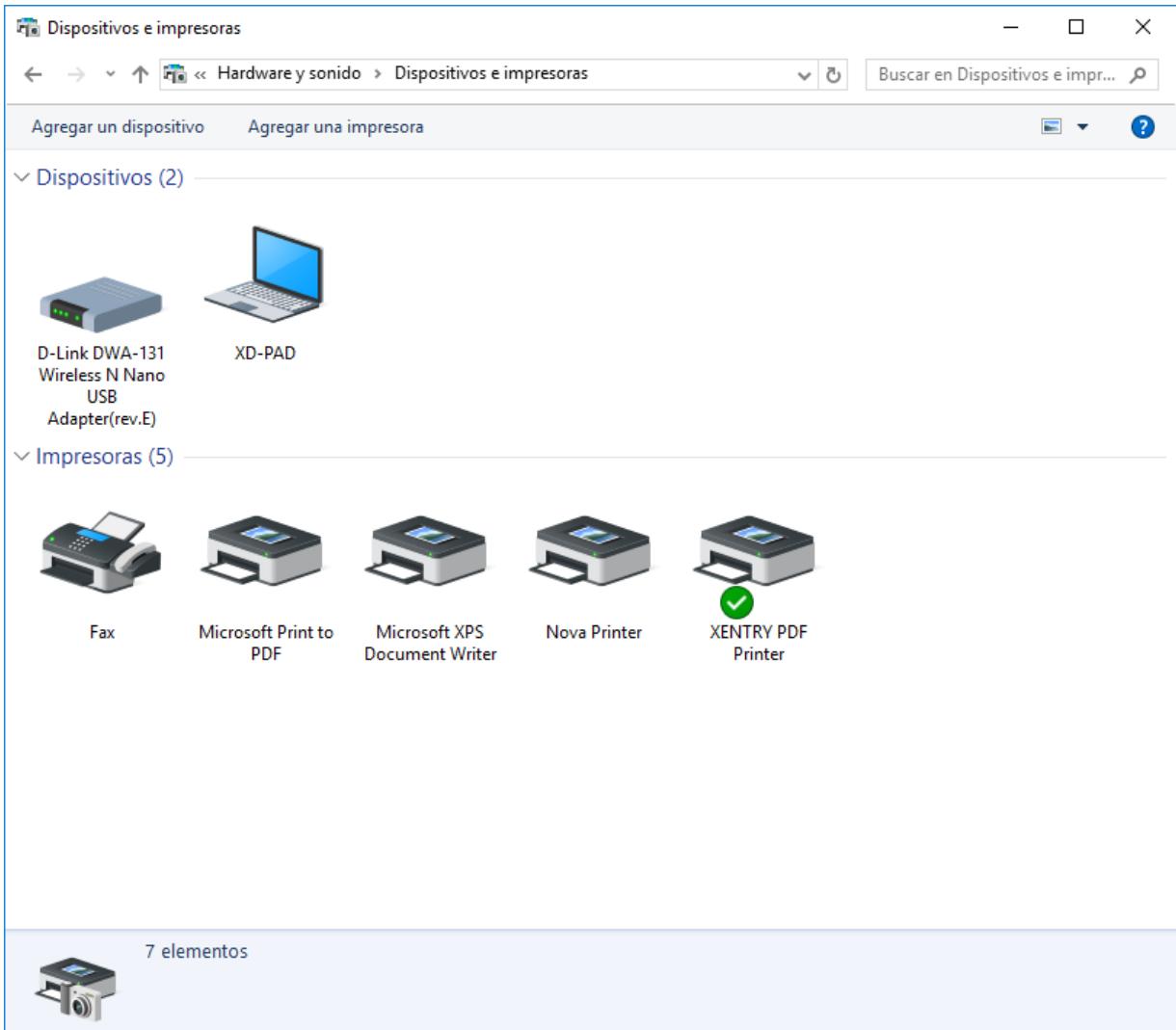


Ilustración 28: Impresoras instaladas actualmente

4. Encienda la impresora USB que desee y conéctela mediante un cable de conexión USB adecuado con el XENTRY Diagnosis Pad.

La impresora se mostrará en un primer momento en el área "No especificado"; al mismo tiempo se instalarán los controladores de impresora. El proceso puede durar varios minutos.

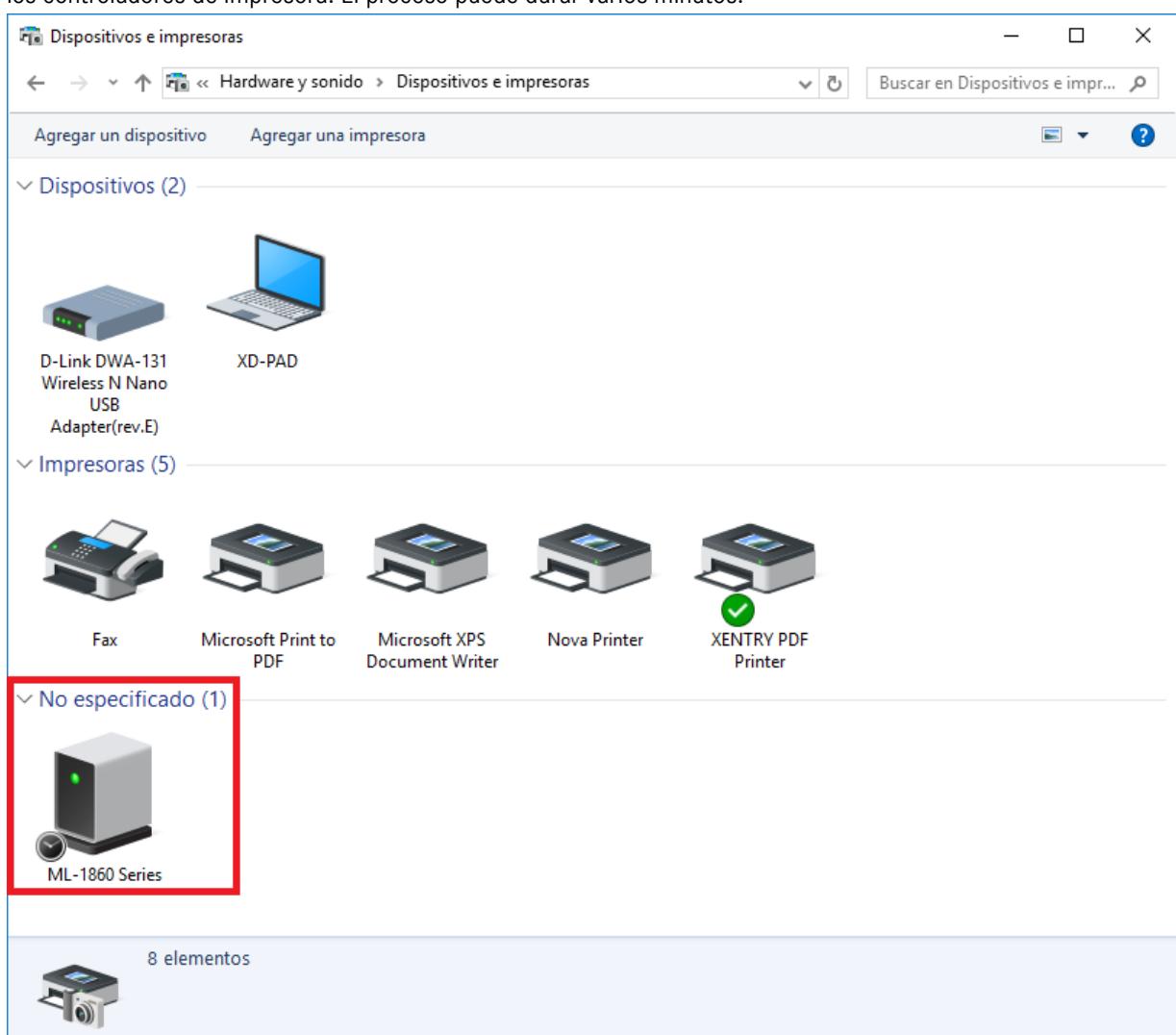


Ilustración 29: Impresora detectada, instalación en curso

5. Una vez efectuada la instalación, la impresora se mostrará en el área "Impresoras".

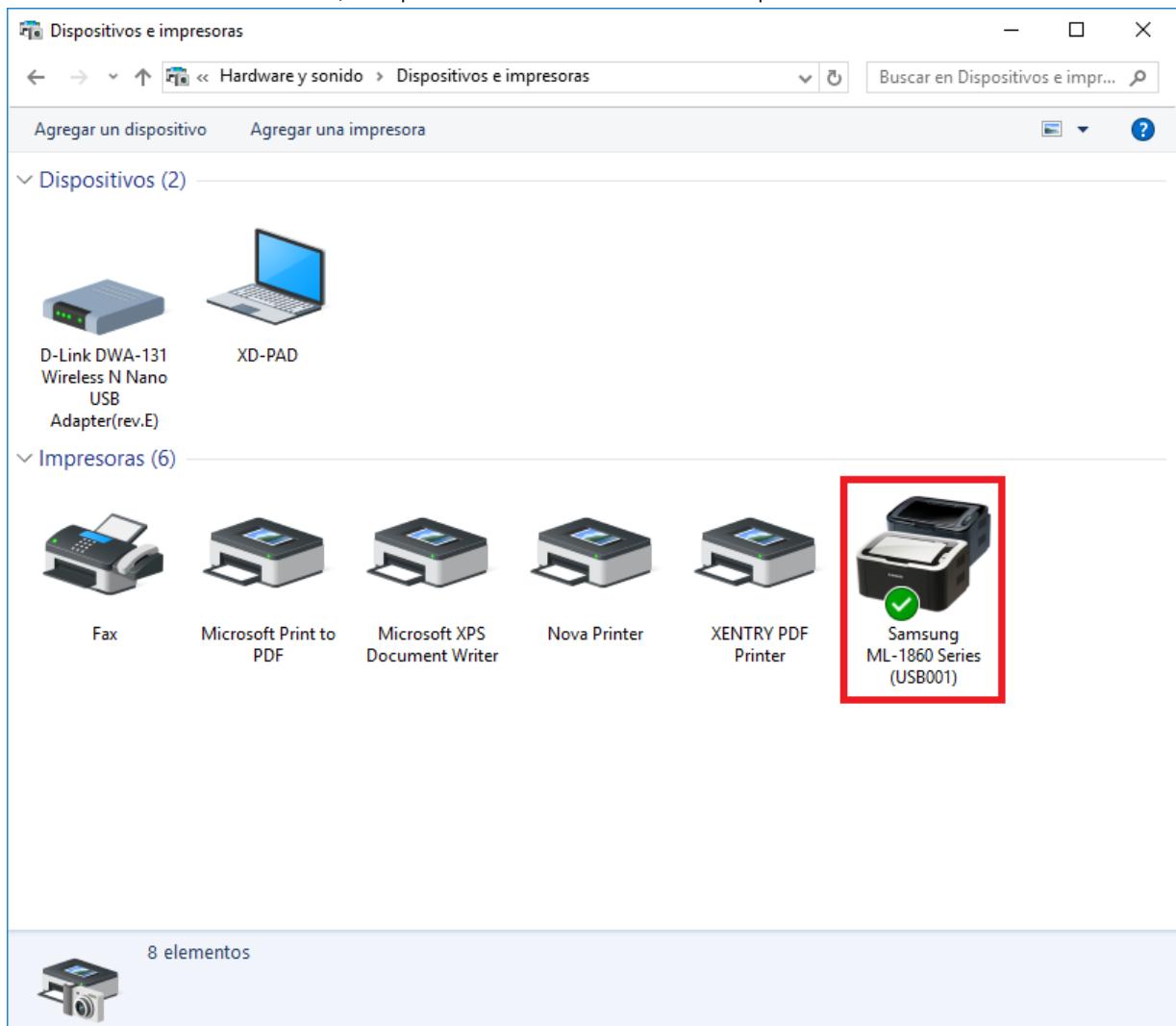


Ilustración 30: Impresora instalada

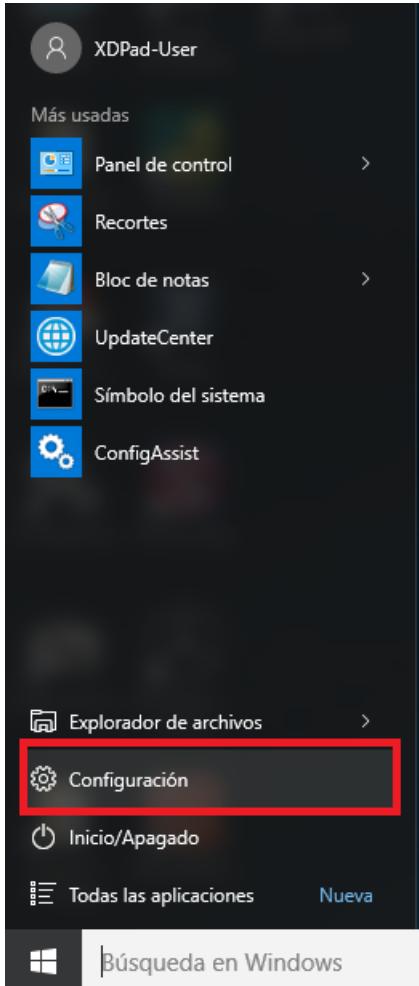
Con el XENTRY Diagnosis Kit 4 también tiene la posibilidad de crear archivos PDF. Encontrará una descripción detallada del PDF Center en el capítulo 7.4, página 69.

4.6.2. Instalación de una impresora de red

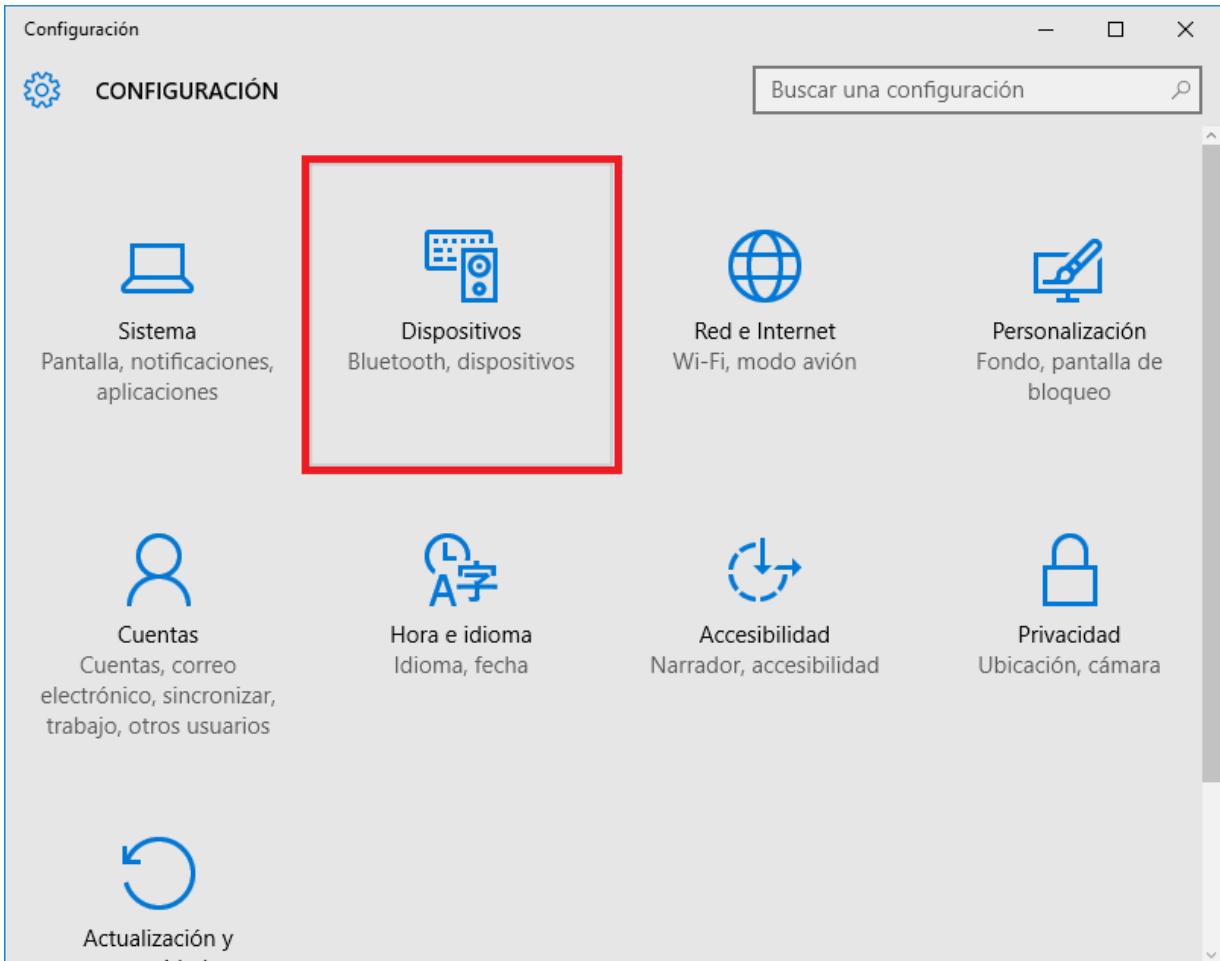
A continuación se describe la configuración de una impresora de red que se encuentre en la misma red que el XENTRY Diagnosis Pad 2.

Encienda la impresora de red y conéctela a la red en la que se encuentra el XENTRY Diagnosis Pad 2.

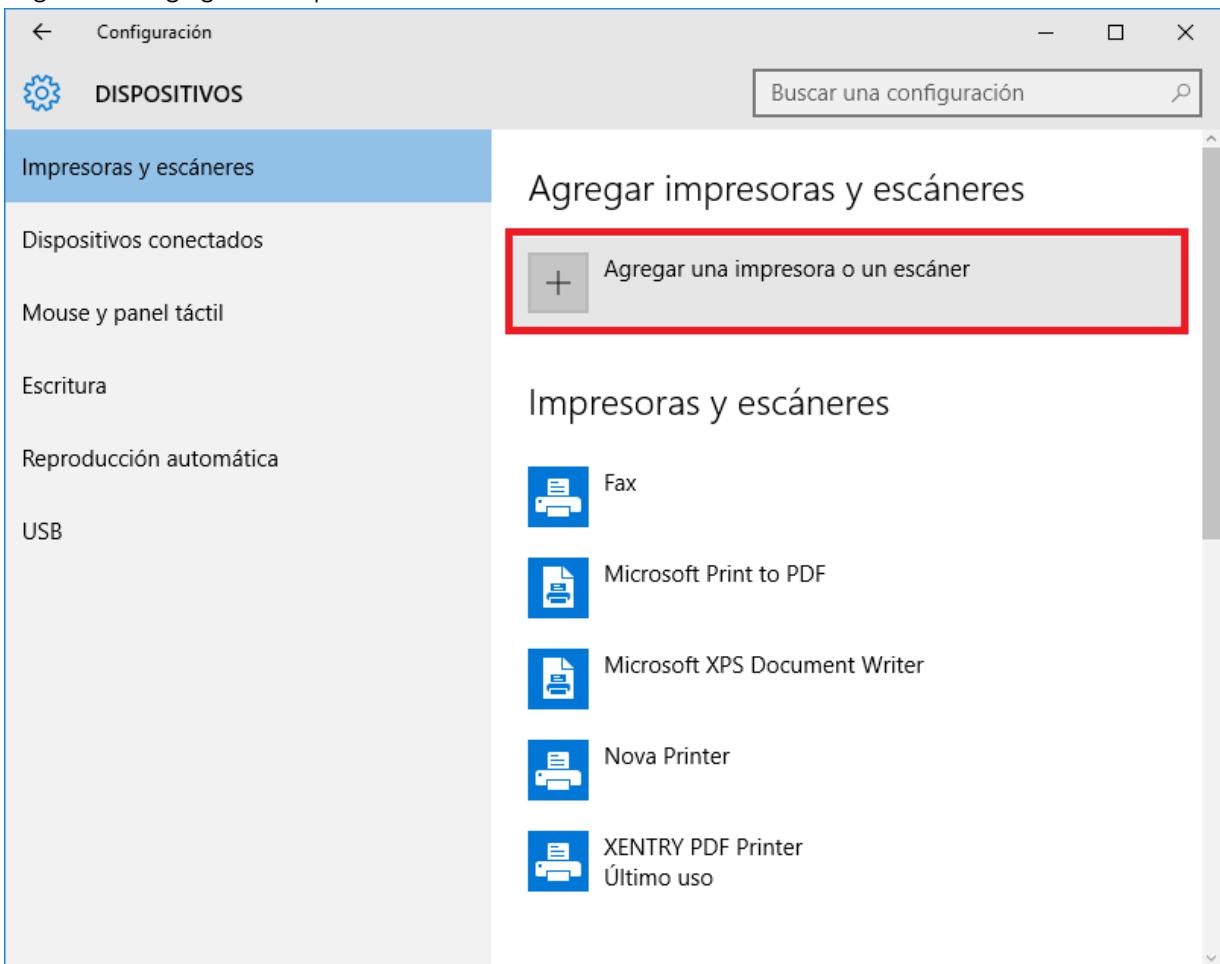
1. Abra "Configuración" desde el menú principal del XENTRY Diagnosis Pad 2.



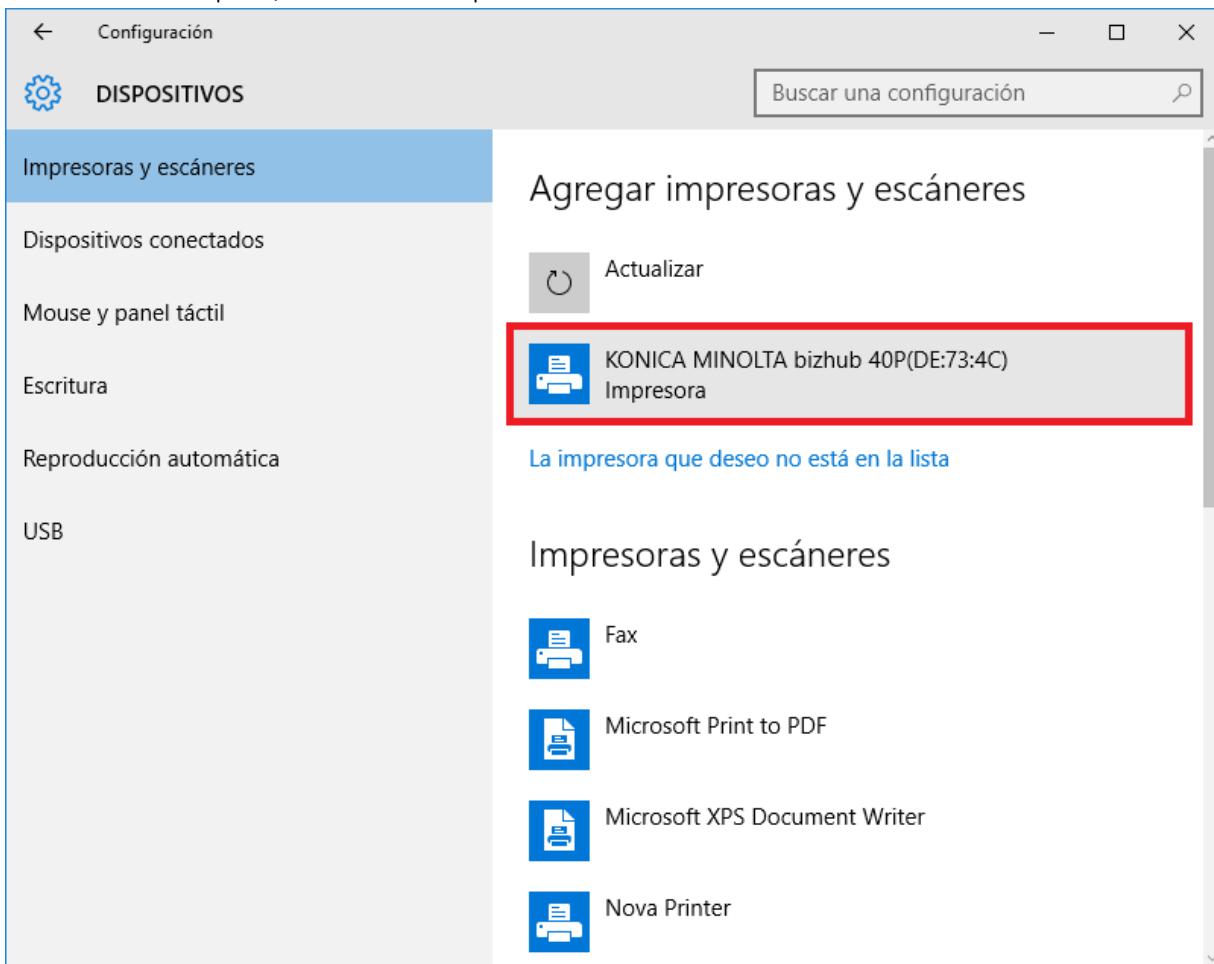
2. Seleccione aquí "Dispositivos – Bluetooth, dispositivos".



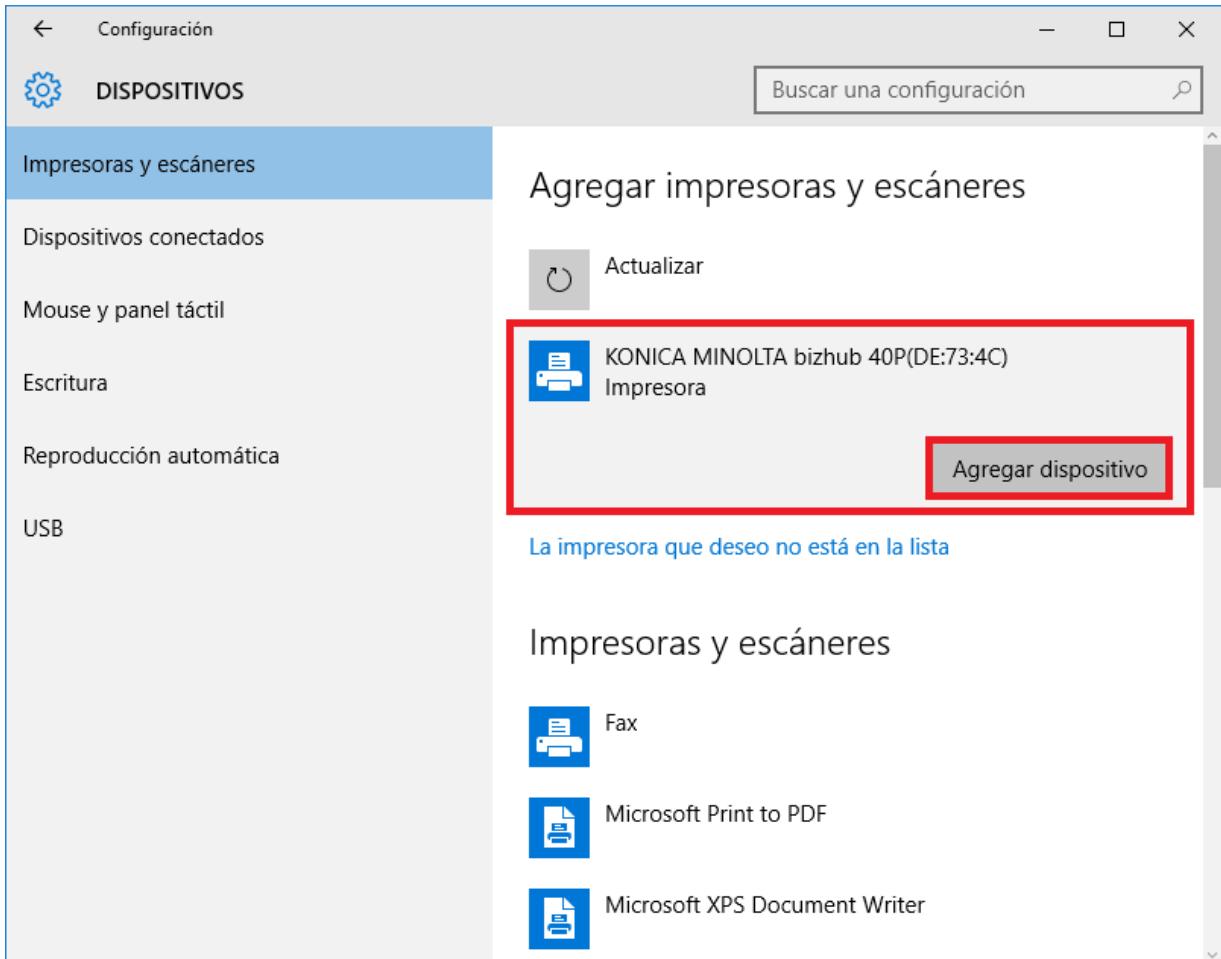
3. Haga clic en "Aregar una impresora o un escáner".



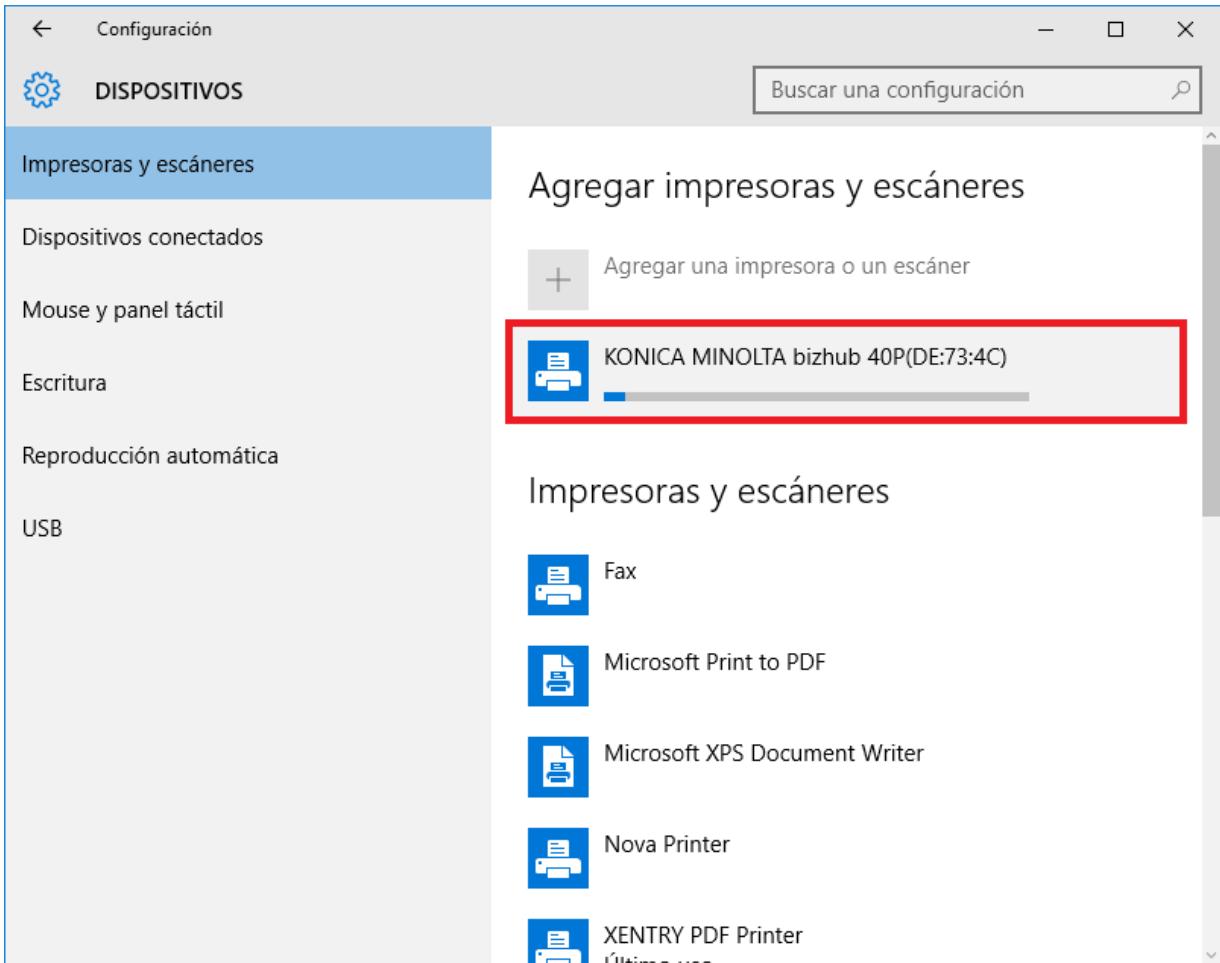
4. Tras una breve búsqueda, se mostrará la impresora de red.



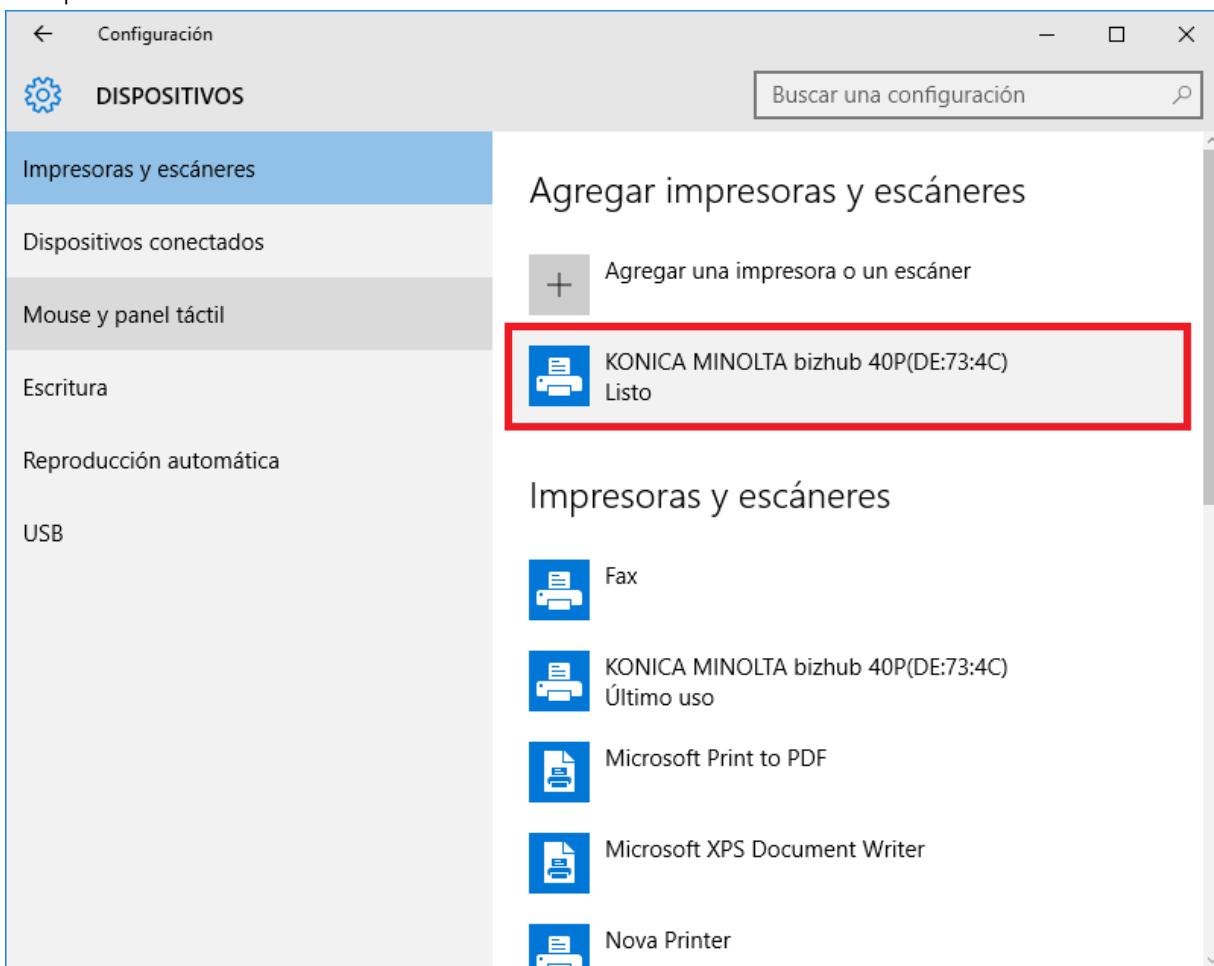
5. Marque la impresora que desea instalar y seleccione a continuación "Aregar dispositivo".



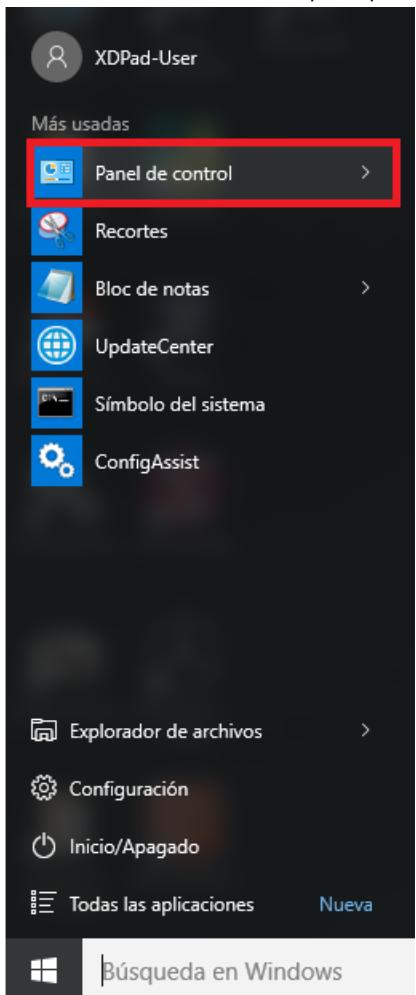
6. Los controladores de impresora se cargan e instalan automáticamente.



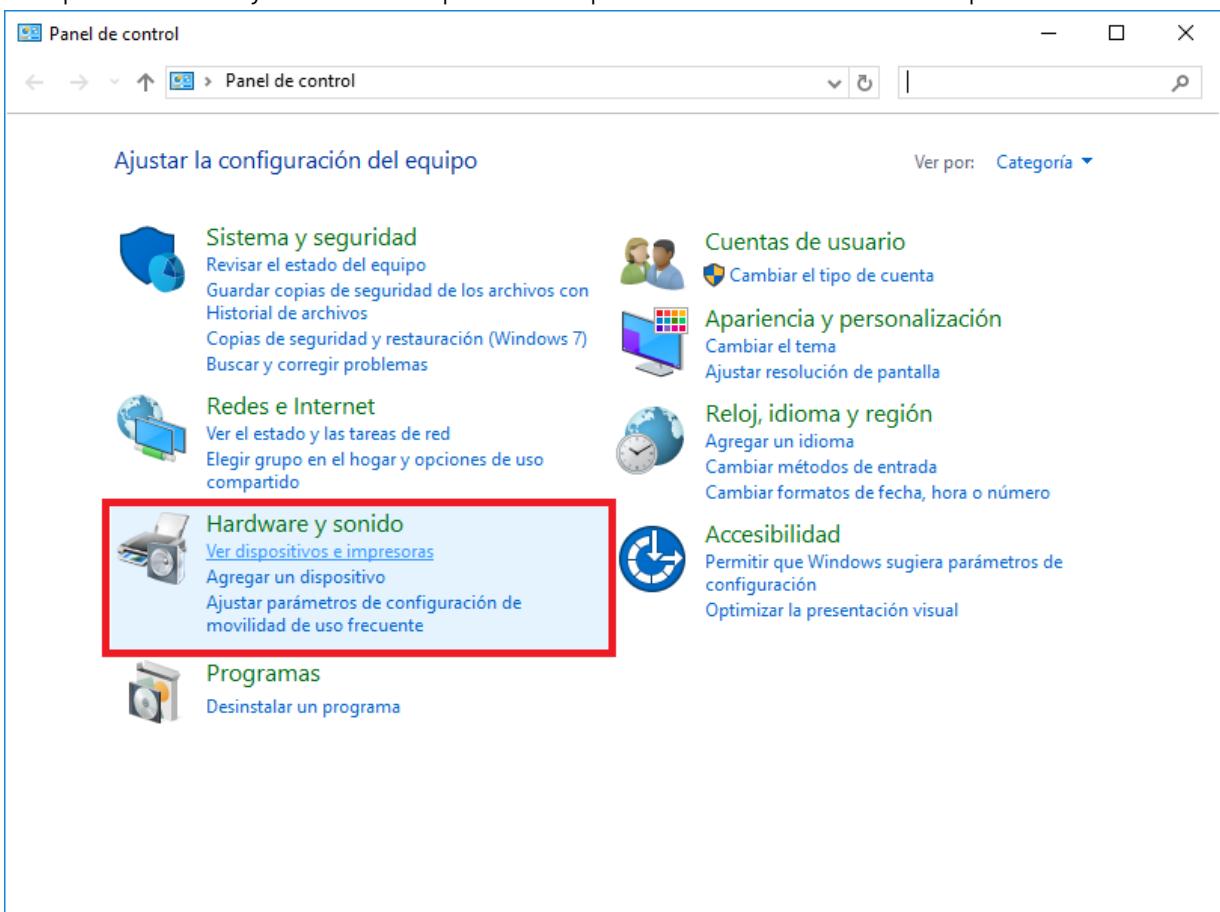
7. La impresora está lista.



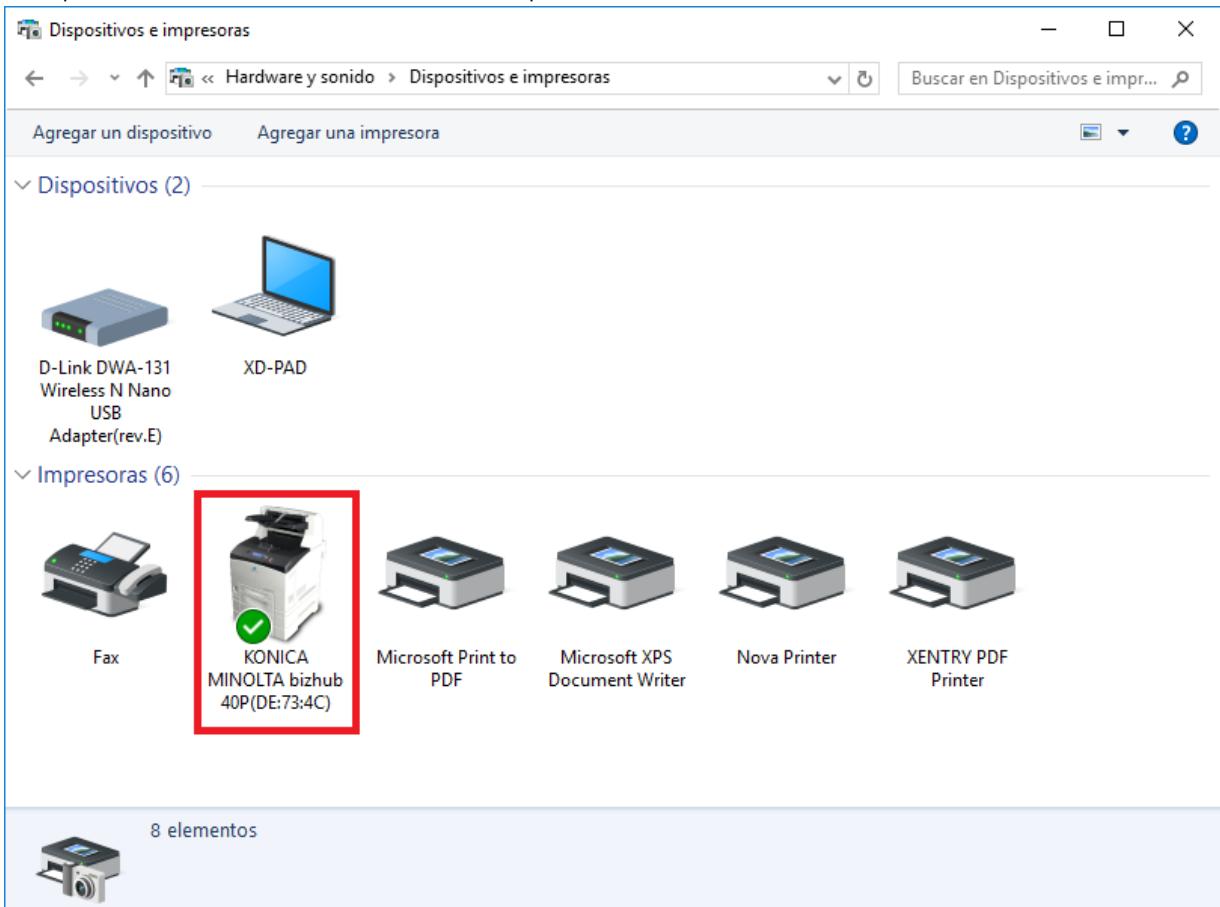
8. Si lo desea, puede efectuar una comprobación a través del panel de control. Para ello, haga clic en el botón "Panel de control" del menú principal.



9. En el punto "Hardware y sonido – Ver dispositivos e impresoras" se muestran todas las impresoras instaladas.



10. La impresora instalada está visible en el área "Impresoras".

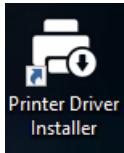


4.6.3. Asistente para la instalación de controladores de impresora

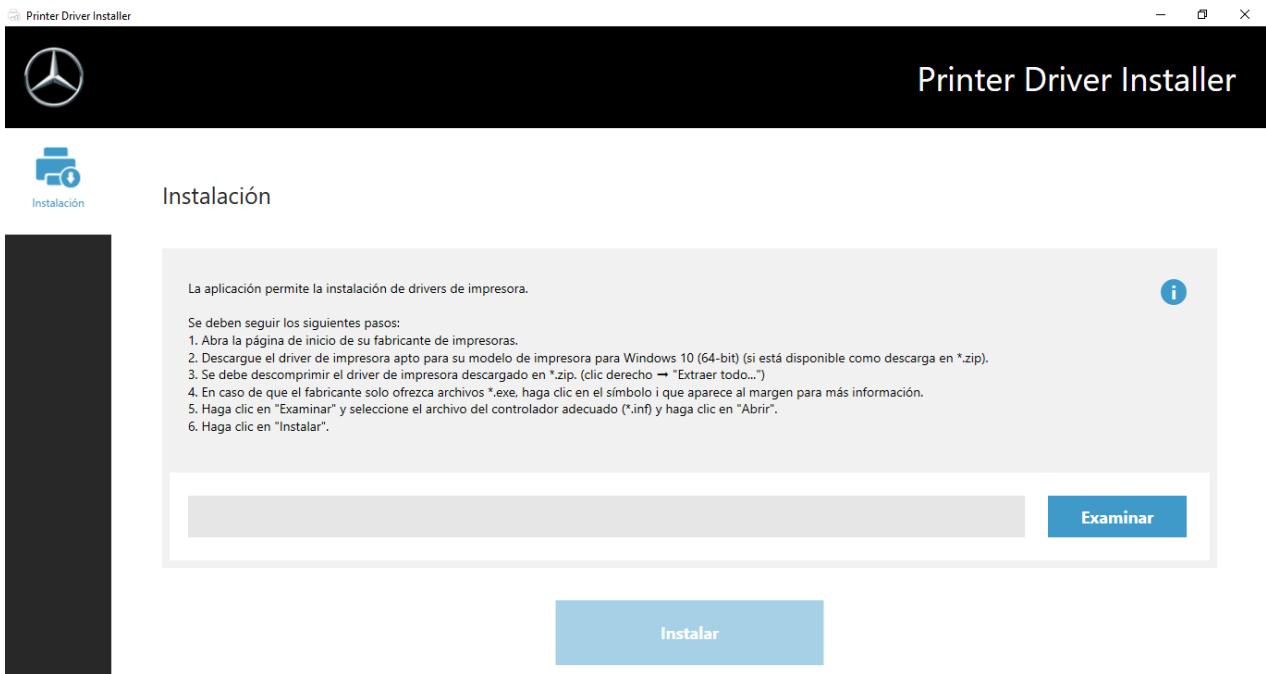
Si durante la instalación de la impresora se le solicita la entrada de la contraseña de administrador, usted tiene dos posibilidades:

Instale el controlador de impresora a través del acceso directo en el escritorio "Printer Driver Installer". El procedimiento para ello se describe a continuación:

1. Abra el Printer Driver Installer a través del acceso directo en el escritorio en su XENTRY Diagnosis Pad.



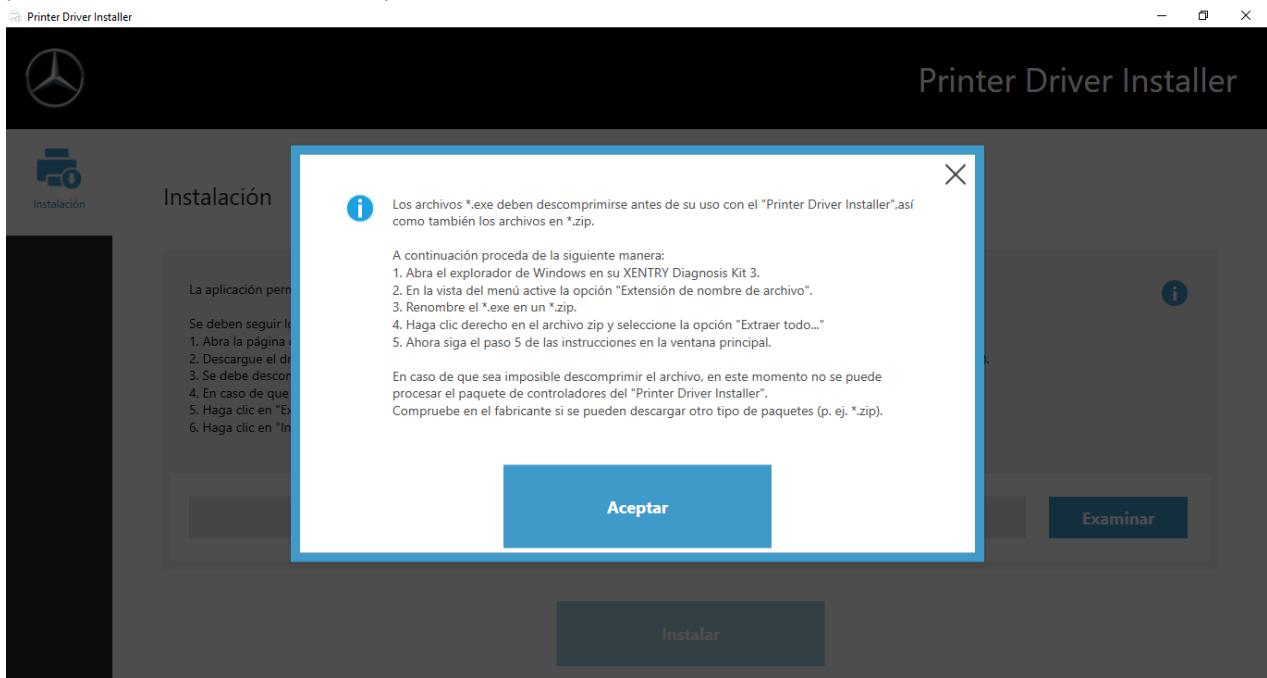
2. Se abre la página de instalación:



Aquí tiene la posibilidad de cargar e instalar directamente el controlador de impresora en el XENTRY Diagnosis Pad 2.

Tenga en cuenta que el Printer Driver Installer actualmente solo procesa archivos *.INF.

Si sólo se dispone del controlador de impresora como archivo *.EXE, entonces haga clic al lado derecho en el botón , para obtener información de cómo proceder:



4.7. Uso del software de unidades de control disponible online

Si utiliza un Retail Data Storage en su empresa, podrá realizar la puesta en servicio de unidades de control online (sin DVD o discos Blu-ray), ya que a partir de ahora el software de unidades de control se obtiene a través del Retail Data Storage.

El software de unidades de control disponible se puede consultar en el XENTRY Update Service Control Center.

The screenshot shows the XENTRY Update Service Control Center interface. At the top, there is a navigation bar with icons for back, forward, search, and user profile. The URL is http://localhost:8013/light/index.html#. Below the navigation bar, the title 'XENTRY Update Service Control Center' and the language 'Versión: | Idioma: ESP ▾' are displayed. On the left, a sidebar menu has three items: a list icon, an eye icon, and a download icon. The main content area is titled 'Software de unidades de control'. It contains a message stating that it lists all existing control unit software sets and provides a search function. A search bar at the top right shows 'Entradas en total 82498'. Below the search bar, there are dropdown menus for 'Entradas por página' (set to 10) and a page number selector (set to 1). A navigation bar at the bottom includes 'Inicio', '<', '1', '8250', '>', and 'FIN'. A table lists three software entries:

Nombre de archivo	Progreso	Estado	Solicitar
0002527015_001-CFF-20190126_1221.zip	[progress bar]	Esperar	<button>Solicitar</button>
0002527015_001-SMR-20190126_1221.zip	[progress bar]	Esperar	<button>Solicitar</button>
0004420060_001-CFF-20200117_1312.zip	[progress bar]	Esperar	<button>Solicitar</button>

Ilustración 31: Software de unidades de control disponibles

Encontrará más información en la guía del usuario "XENTRY Update Service - Puesta en servicio del Retail Data Storage".

4.8. Test breve automático (AKT)

Para poder efectuar el test breve automático (AKT) en la recepción de servicio, el XENTRY Diagnosis Pad 2 debe estar integrado en la red de la recepción para servicio posventa de su empresa y conectado a internet.

Al trabajar en la recepción para servicio posventa, asegúrese de que el XENTRY Diagnosis VCI y el XENTRY Diagnosis Pad 2 estén próximos para que se pueda mantener la conexión por WLAN entre los componentes de hardware.

Como alternativa, puede conectar los componentes de hardware mediante un cable de conexión USB.

Adicionalmente debe disponer de acceso al XENTRY Portal. Encontrará más información en el XENTRY Portal en Recepción de servicio posventa > Diagnóstico en la recepción (test breve automático)

Para activar el modo AKT, abra en el escritorio del XENTRY Diagnosis Pad 2 el acceso directo "XENTRY Diagnosis AKT".



Ilustración 32: Icono XENTRY Diagnosis AKT

Se le solicitará que se registre una sola vez con su nombre de usuario y contraseña:

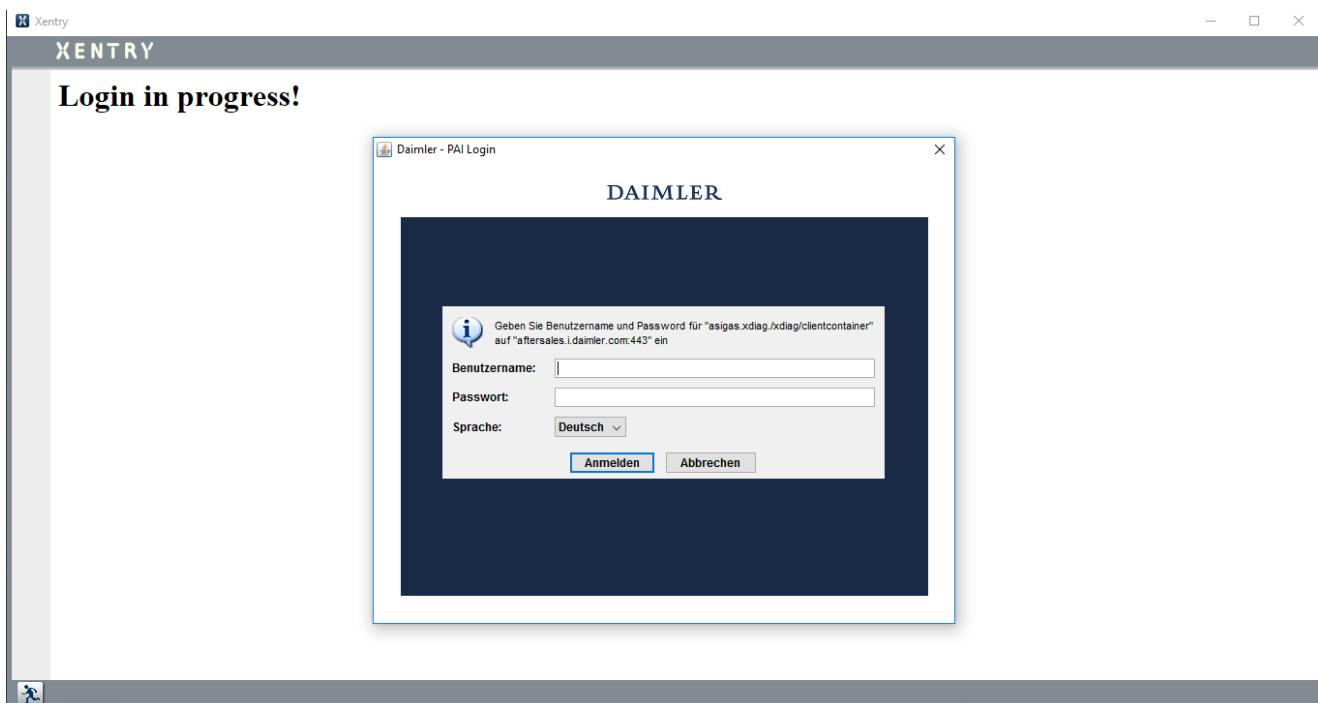


Ilustración 33: Inicio de sesión en XENTRY Diagnosis AKT

El XENTRY Diagnosis VCI ahora está listo para realizar el test breve automático.

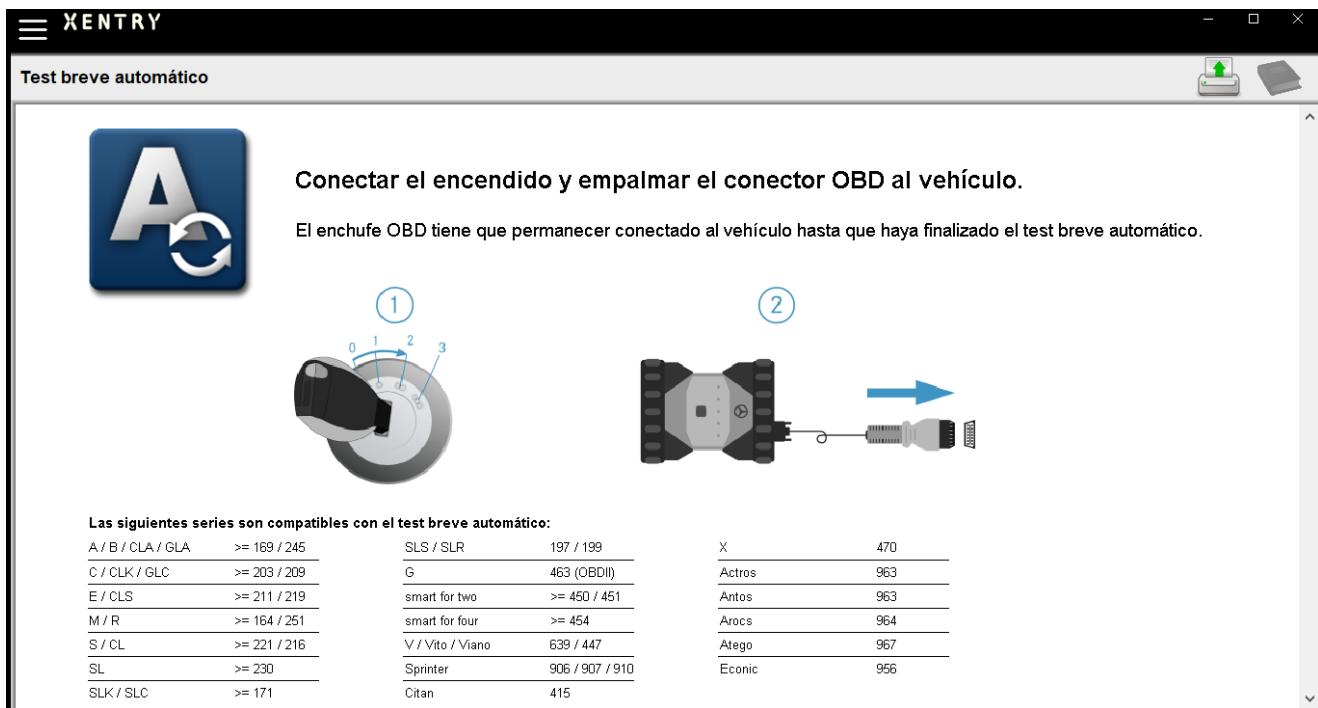


Ilustración 34: Pantalla de inicio de XENTRY AKT

Proceda del siguiente modo:

1. Conecte el encendido del vehículo (**¡Importante!**)
2. Conecte el XENTRY Diagnosis VCI con la caja de enchufe OBD del vehículo.
3. El test breve se inicia; puede seguir el progreso en el XENTRY Diagnosis Pad:

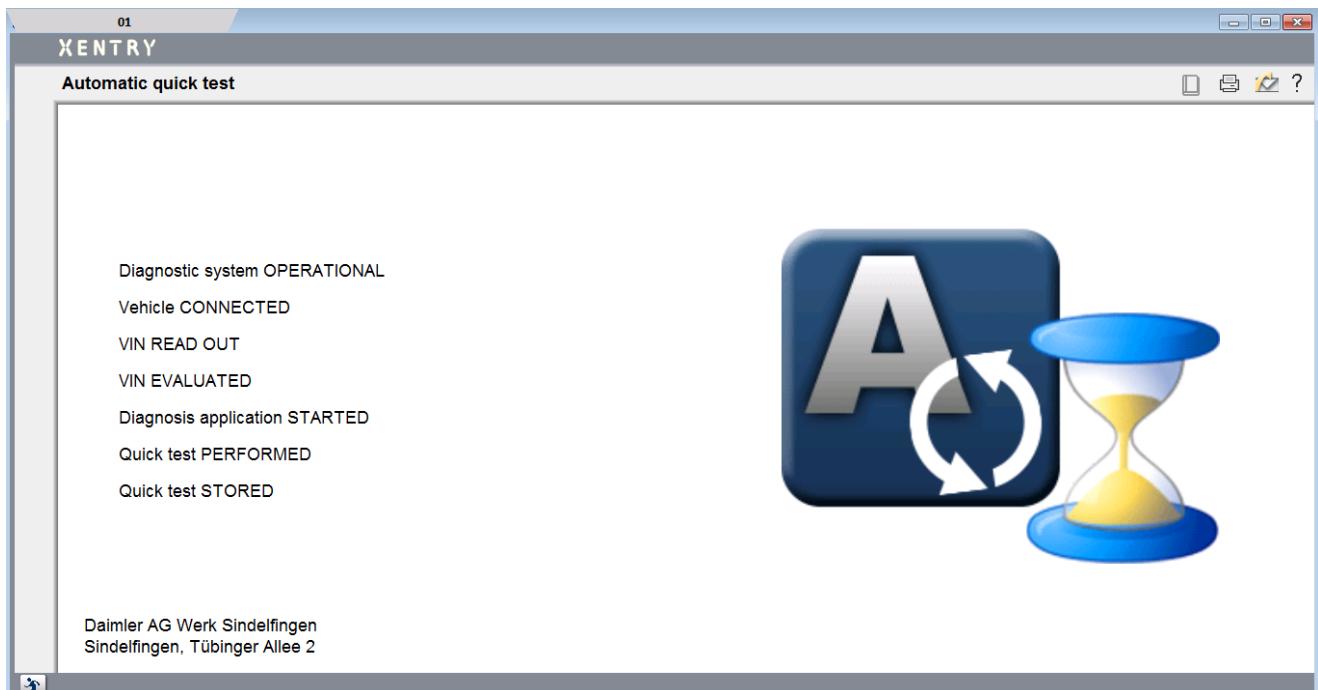


Ilustración 35: Ejecución del XENTRY AKT

4. Al cabo de unos minutos (en función de la serie y del equipamiento del vehículo), el test breve habrá finalizado y se transmitirá automáticamente al XENTRY Portal a través de la red (la indicación de estado del test breve se puede consultar en el XENTRY Diagnosis Pad).
5. Finalice la conexión con el vehículo cuando se le solicite en el visualizador del XENTRY Diagnosis Pad que extraiga el conector OBD.
6. El test breve está ahora disponible en el XENTRY Portal.

Ya puede usar el XENTRY Diagnosis VCI en el siguiente vehículo.

Tras el último test breve automático puede finalizar el modo AKT. Para ello, cierre el programa "XENTRY AKT" en el XENTRY Diagnosis Pad.

4.9. XENTRY WIS / XENTRY Operation Time

4.9.1. El nuevo sistema de información para el taller (XENTRY WIS)

Información con solo pulsar un botón con XENTRY WIS

Todas las descripciones técnicas, instrucciones de trabajo e información que necesita usted para su mantenimiento o reparación, ya están disponibles en el nuevo **XENTRY WIS**. Su moderno sistema de información para el taller convence con su nuevo diseño, se integra cómodamente en **XENTRY Portal** y también se puede usar en sus **dispositivos móviles**. Con solo pulsar un botón obtendrá, en cualquier momento y lugar, **datos actualizados y precisos sobre su orden de taller**. Esto le permite tramitar su encargo de forma eficiente y actuar de forma específica.



Ilustración 36: Acceso directo a XENTRY WIS

Funcionalidades optimizadas en un diseño moderno

Benefíciense de su nuevo sistema de información para el taller:

- Integración en el conjunto de sistemas y procesos posventa existentes: diseño uniforme, aplicación simplificada y mayor interconexión en red de la información posventa
- Ya no se requieren clientes JAVA/OWS
- El mismo concepto de manejo permite una rápida familiarización
- Información específica del vehículo sobre la reparación y el mantenimiento desde una sola procedencia
- Información actualizada para un óptimo servicio de mantenimiento y reparación según las prescripciones del fabricante
- Nuevo diseño de producto: búsqueda de información para el taller en un nuevo diseño estilizado
- Uso en dispositivos móviles

https://xentry.mercedes-benz.com/information/content/display/xentry_wis_overview

Indicación: WIS/ASRA Offline/Standalone

A partir de enero de 2023, WIS/ASRA Offline/Standalone dejará de ser compatible. Ya en diciembre de 2021, se interrumpió la posibilidad de realizar pedidos de los distintos productos offline en XENTRY Shop. Cambie su configuración en la herramienta de configuración WIS; a más tardar cuando expiren las StartKeys actuales (WIS Configuration Tool → Vista de conjunto → Modo WIS → "Online").

4.9.2.XENTRY Operation Time – Operar más intuitivamente, buscar más rápido, encontrar más fácilmente

A partir de ahora, podrá buscar toda la información necesaria sobre **las posiciones de trabajo y las horas de trabajo necesarias** en un abrir y cerrar de ojos. **XENTRY Operation Time proporciona datos diarios basados en FIN/VIN de la más alta calidad.**

La nueva interfaz gráfica de usuario, intuitiva y moderna, muestra toda la información relevante en sólo dos pantallas. XENTRY Operation Time se integra perfectamente en XENTRY Portal / XENTRY Diagnosis y también puede utilizarse en otros dispositivos móviles.

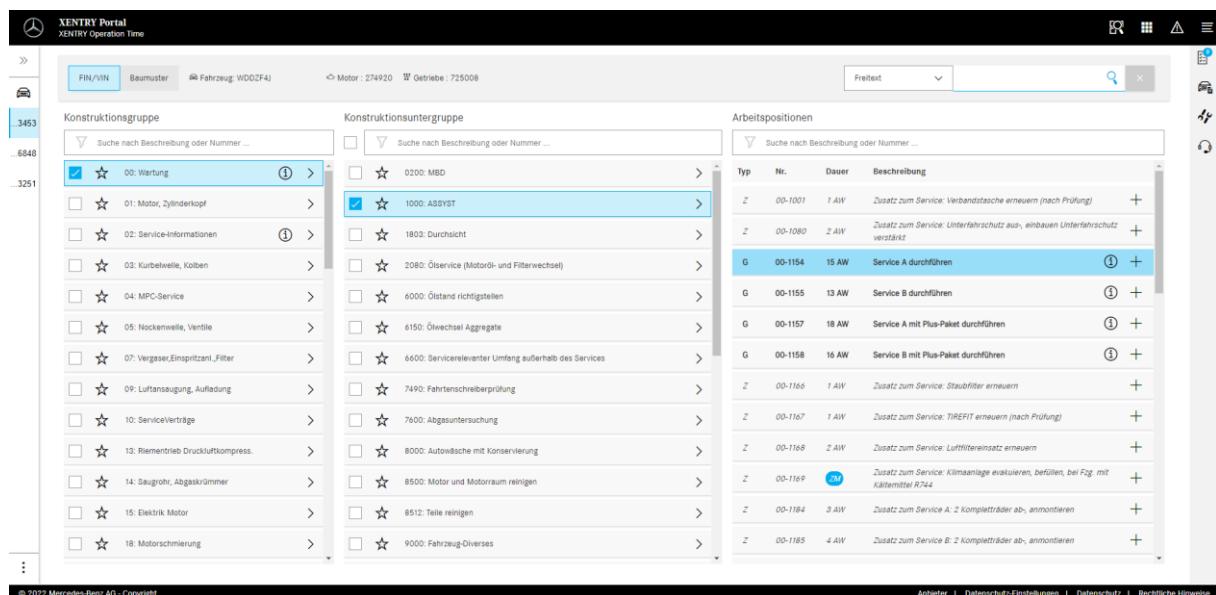


Ilustración 37: Acceso directo a XENTRY Operation Time

Todas las ventajas de un solo vistazo:

- Información actual sobre las posiciones y las horas de trabajo
- Opciones de filtrado específicas del FIN/VIN
- Funciones de búsqueda mejoradas e intuitivas
- Desarrollo continuo que permite corregir diariamente los datos
- Uso en dispositivos móviles
- Integración en XENTRY Portal / XENTRY Diagnosis para una interconexión en red óptima de aplicaciones e información
- Ya no se requieren clientes JAVA/OWS

https://xentry.mercedes-benz.com/information/content/display/xentry_operation_time_overview

4.9.3. Acceso a XENTRY WIS/XENTRY Operation Time a través del marco de XENTRY

Tiene la posibilidad de abrir XENTRY WIS y XENTRY Operation Time desde el marco de XENTRY.

Para ello debe iniciar sesión con su ID de usuario EMEA y la correspondiente contraseña de inicio de sesión único.

The screenshot shows the Mercedes-Benz Service & Parts net homepage. At the top, there's a navigation bar with links to Daimler AG, FAQ, Contacto, Condiciones generales de contrato, Sprache/Language, Inicio, Información de Servicio y Piezas, El mundo del diagnóstico, Taller y Herramientas, Info-Center, and Enlaces. Below the navigation, a banner reads "Service & Parts net - Información original del fabricante para el taller de vehículos Mercedes-Benz y smart". A large image of a silver Mercedes-Benz car parked in front of a modern building is displayed. To the right of the image is a login form titled "Inicio de sesión para los sistemas EPC, WIS, ASRA". It includes fields for "Nombre de usuario" and "Contraseña", a "Iniciar la sesión" button, and links for "¿Ha olvidado su contraseña?", "Registro", and "Entrada rápida". Under "Entrada rápida", there are links for "Acceso a herramientas especiales", "Acceso a TechInfo-Shop", "Búsqueda de concesionarios", and "Informaciones nacionales". A note at the bottom left says "For DSB use only Microsoft Internet Explorer (version 8 or higher)!" and a small note at the bottom right mentions "Con nuestro portal nos dirigimos a talleres y empresas autónomos situados en la Unión Europea que reparan y mantienen de manera profesional vehículos de Mercedes-Benz y smart".

Ilustración 38: Acceso directo a XENTRY WIS/Operation Time desde el marco de XENTRY

Indicación

Tenga en cuenta: tan pronto como esté ajustado un contexto de vehículo en el marco de XENTRY (visible por los datos del vehículo al pie de página de XENTRY), éstos se transfieren a las aplicaciones. XENTRY WIS y XENTRY Operation Time ajustan entonces estos datos del vehículo como contexto de búsqueda.

4.9.4. Acceso a XENTRY WIS/ XENTRY Operation Time a través de la sesión de diagnóstico

Además del acceso a WIS/ASRA desde XENTRY, donde se transmite el contexto de vehículo a WIS/ASRA, también es posible acceder a WIS/ASRA desde la sesión de diagnóstico, desde diferentes vistas de funciones o unidades de control.

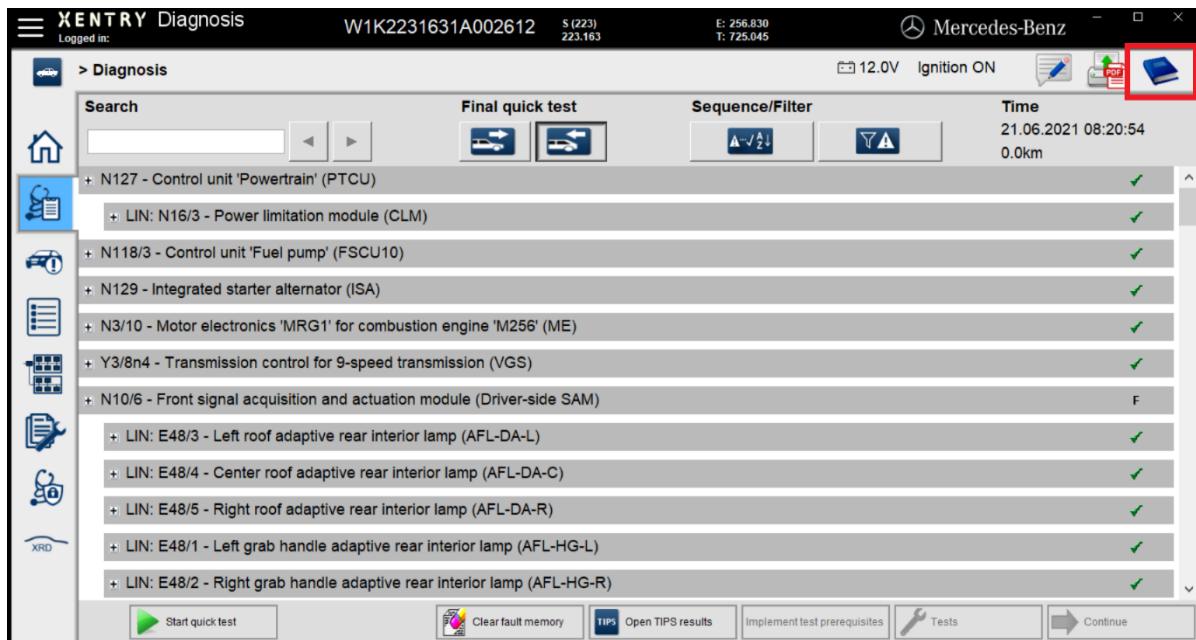


Ilustración 39: Acceso directo a XENTRY WIS/ Operation time desde la sesión de diagnóstico

4.9.5.Esquemas de circuitos específicos del vehículo vía "Dynamic Wiring Diagram"

A partir del 12.10.2021, en el marco del lanzamiento de XENTRY WIS, estará disponible para todos los usuarios de WIS el nuevo módulo "Dynamic Wiring Diagram" en XENTRY Portal y XENTRY Diagnosis.

Mediante la representación específica del FIN de "Dynamic Wiring Diagram" al usuario se le muestra exclusivamente el esquema de circuitos relevante para su vehículo. Se suprime la complicada búsqueda del equipamiento del vehículo y los cambios de sistema. Tanto esto como otras funciones de búsqueda y filtrado ayudan al usuario y contribuyen notablemente a la reducción de posibles errores de búsqueda durante el proceso de reparación y diagnóstico. Asimismo, puede visualizarse otra información, por ejemplo, sobre componentes, con solo un clic.

El acceso a "Dynamic Wiring Diagram" está asociado a la autorización de WIS, por lo que no se requiere un pedido por separado. Tenga en cuenta que desde finales de 2021 los esquemas de circuitos relativos a nuevos lanzamientos y reestilizaciones solo estarán disponibles en el módulo "Dynamic Wiring Diagram". Por ello, es preferible que utilice este módulo para buscar el esquema de circuitos.

Acceso a Dynamic Wiring Diagram desde la pantalla inicial y el test breve

1. Abra "Dynamic Wiring Diagram" con el símbolo de libro situado arriba a la derecha.



Ilustración 40: Diagramas de cableado específicos del vehículo a través de "Dynamic Wiring Diagram"

2. Abra la lista de todas las unidades de control del test breve. Tras abrir un esquema de circuitos se muestran todos los componentes dentro de dicho esquema de circuitos.

Mediante el campo de búsqueda puede filtrar los componentes mostrados.

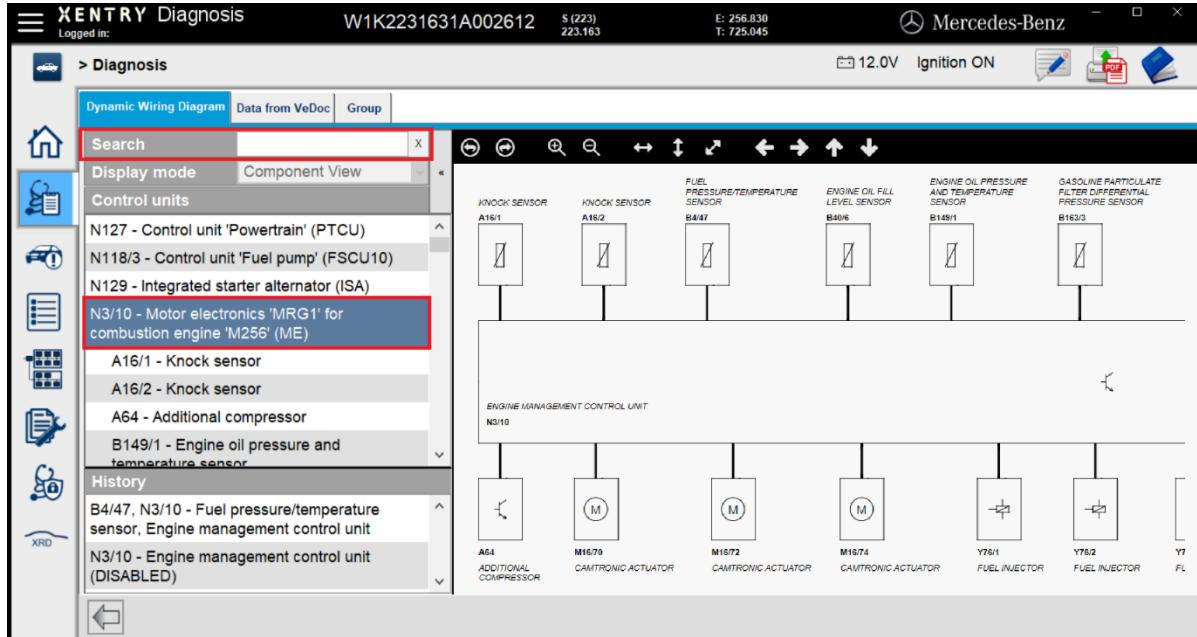


Ilustración 41: Visión general de los componentes dentro del diagrama del circuito

3. Seleccione el componente deseado. El lugar de montaje correspondiente se le muestra en el lado derecho.

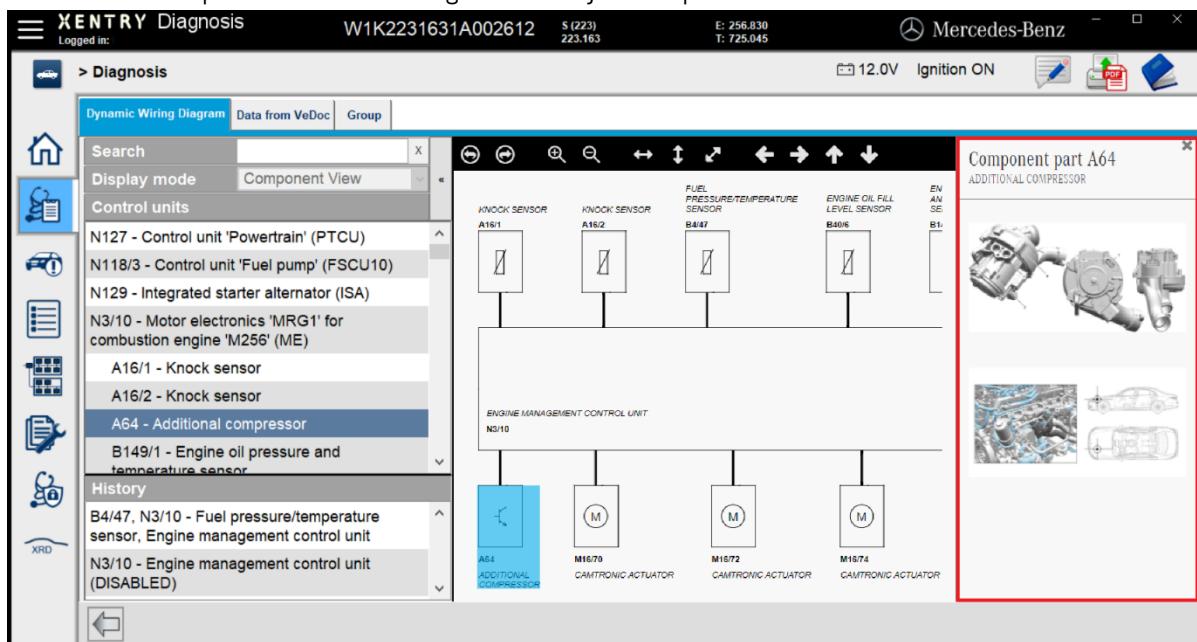


Ilustración 42: Selección de los componentes y el lugar de instalación correspondiente

5. Componentes de hardware

5.1. XENTRY Diagnosis Pad 2

5.1.1. Características técnicas del XENTRY Diagnosis Pad 2



Ilustración 43: Vista del XENTRY Diagnosis Pad 2

- Disco duro: 1 TB SSD
- Memoria de trabajo: 16 GB DDR4
- Procesador: Intel ® Core™ i5
- Sistema operativo: Windows 10 IoT
- Dimensiones: aprox. 338 x 240 x 33 mm (An. x La. x Al.)
- Peso: aprox. 2,3 kg
- Cómodo manejo gracias a:
 - Soporte progresivo
 - Visualizador multitáctil capacitivo Full HD
 - Buena legibilidad del visualizador

5.1.2. Conexiones del XENTRY Diagnosis Pad 2

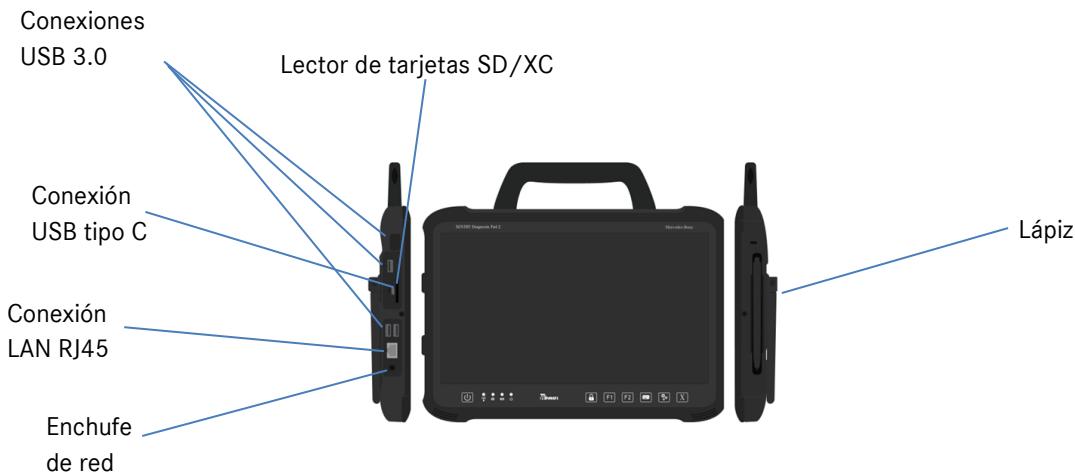
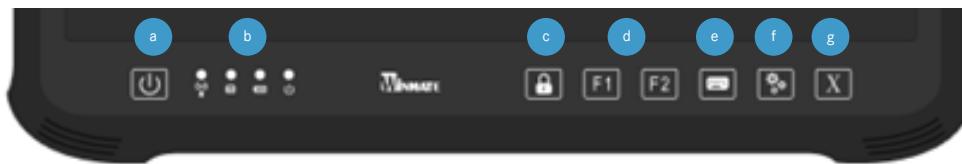


Ilustración 44: Conexiones del XENTRY Diagnosis Pad 2

5.1.3. Teclas e indicadores del XENTRY Diagnosis Pad 2

El XENTRY Diagnosis Pad 2 dispone de las siguientes teclas y los siguientes indicadores:



- | | | | |
|----------|---|----------|--|
| a | Aquí puede encender el XENTRY Diagnosis Pad 2. | e | Mostrar/ocultar el teclado virtual |
| b | Indicaciones de estado LED para WLAN, uso del disco duro, batería, estado de funcionamiento | f | Configuración |
| c | Bloqueo de pantalla | g | Apertura del XENTRY Diagnosis Software |
| d | Teclas F1 y F2, de ocupación libre | | |

5.2. XENTRY Diagnosis VCI

5.2.1. Características técnicas del XENTRY Diagnosis VCI



Ilustración 45: XENTRY Diagnosis VCI

- Material: policarbonato con caperuzas de goma
- Sin batería
- Sin visualizador
- Conexión del VCI con el Pad a través de WLAN, mediante memorias USB WLAN; no se necesita tener infraestructura WLAN
- El XENTRY Diagnosis VCI cuenta con una tecla. Esta tecla se utiliza para casos de aplicación especiales en la herramienta XENTRY CAN.
- El VCI no necesita fuente de alimentación para la alimentación eléctrica externa.
- El VCI se desconecta automáticamente cuando no está conectado a un vehículo o con un cable de conexión OBD/USB. Se conecta automáticamente cuando vuelve a haber alimentación eléctrica.

Propiedad	Valor/rango
Interfaz de host	
Por cable	USB 2.0 de alta velocidad
Dispositivo USB WiFi inalámbrico	802.11b/g/n
Sistema del procesador	
Microporcesador	Intel MX6 Solo
Número de ciclos	800 MHz
RAM	512 MB DDR3 RAM
ROM	512 MB Flash
Memoria de masa (ópt.)	Memoria USB
Interfaz gráfica de usuario	
LED	5 LED de estado
Emisor de señales acústicas	Señal acústica
Alimentación eléctrica	
De la batería del vehículo mediante el cable de conexión de diagnóstico o mediante un cable de conexión USB conectado.	OBD: 8 a 28 V CC; 750 mA USB: 5 V CC; 700 mA
Atención:	
La hembrilla de contacto del vehículo debe estar protegida con un fusible de 6 A/32 V como máximo.	
Propiedades mecánicas	
Dimensiones	168 x 115 x 45 mm
Peso	0,41 kg
Temperatura de servicio	-20 °C - +60 °C
Temperatura de almacenamiento	-40 °C - +80 °C
Humedad del aire a 25 °C	30 % - 95 %
Altitud de servicio máxima	4000 m
Clase de protección con el cable de conexión de diagnóstico no enchufado	IP 30
Clase de protección con el cable de conexión de diagnóstico atornillado según IEC60529	IP 54; categoría 2
Grado de suciedad	2
Cable de conexión de diagnóstico	
J1962 (ISO 15031-3)	26 pinos; calificación 28V; CAT O
Certificaciones VCI	
UE	
EE. UU.	
Corea del Sur	
Rusia	
Australia	
Ucrania	

Tabla 1: Datos técnicos del XENTRY Diagnosis VCI

Ámbito de aplicación

El XENTRY Diagnosis VCI está previsto exclusivamente para el uso en interiores.

- Grado de suciedad 2, el área en torno al XENTRY Diagnosis VCI debe mantenerse limpia
- Se debe evitar la condensación de agua, no se debe exponer el XENTRY Diagnosis VCI a la lluvia ni a la humedad

5.2.2. Conexiones y elementos de mando del XENTRY Diagnosis VCI

En el XENTRY Diagnosis VCI se encuentran las siguientes conexiones y los siguientes elementos de mando:



Ilustración 46: Conexión del XENTRY Diagnosis VCI

5.2.3.Indicadores de estado y elementos de mando del XENTRY Diagnosis VCI



Ilustración 47: Indicadores de estado y elementos de mando del XENTRY Diagnosis VCI

Indicadores de estado

	Testigo de control, LED verde
	Testigo de avería, LED rojo
	LED rojo/verde/naranja
	Indicador de la conexión VCI ↔ Pad, LED verde intermitente
	Indicador de la conexión VCI ↔ vehículo, LED verde intermitente

Ilustración 48: Indicadores de estado del VCI

Elemento de mando



Ilustración 49: Tecla del VCI

El XENTRY Diagnosis VCI cuenta con una tecla. Esta tecla se utiliza para casos de aplicación especiales en la herramienta XENTRY CAN.

6. Accesorios

6.1. Accesorios de pedido opcional

Durante el proceso de configuración, se le indicarán los accesorios de pedido opcional.

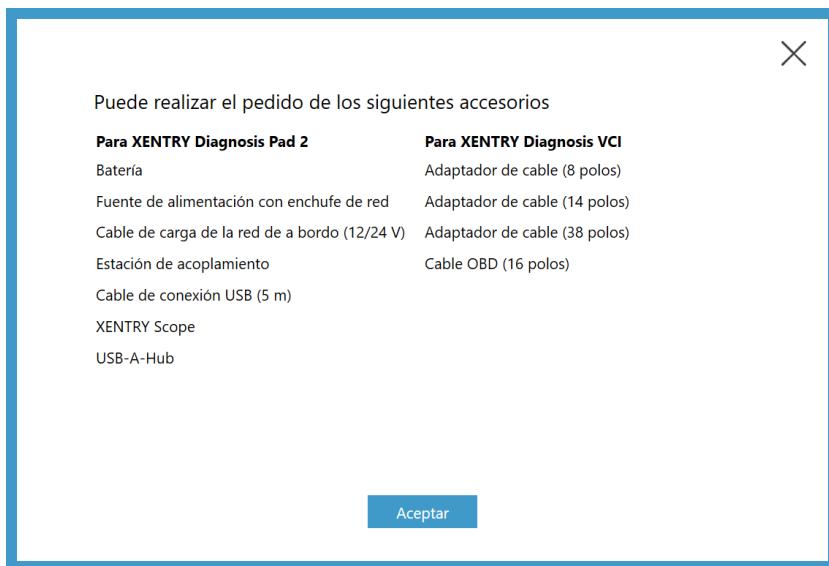


Ilustración 50: Accesorios de pedido opcional

La estación de acoplamiento ofrece otras conexiones más como, p. ej., conexiones USB y una posibilidad de conexión para una pantalla o un proyector.



Ilustración 51: Estación de acoplamiento (dockstation)

6.2. Técnica de medición XENTRY Scope

Podrá obtener más información sobre la técnica de medición XENTRY Scope en la documentación sobre XENTRY Scope o directamente en XENTRY Scope Software. Esta ya está instalada en su XENTRY Diagnosis Pad | Pad 2.



Ilustración 52: XENTRY Scope

6.3. Escáner de inyectores (escáner manual 2D)

El escáner de inyectores (escáner manual 2D) se conecta al XENTRY Diagnosis Pad | Pad 2 por USB. El software se instala automáticamente y se puede utilizar después de reiniciar el XENTRY Diagnosis Pad | Pad 2.

6.4. Unidad de diagnóstico para baterías HV

La unidad de diagnóstico se conecta al XENTRY Diagnosis Pad | Pad 2 a través del cable OBD. El proceso de comprobación de la batería HV se ejecuta en el XENTRY Diagnosis Software.

6.5. SBC Flashbox

La SBC Flashbox se conecta al XENTRY Diagnosis Pad | Pad 2 con un adaptador RS232-USB.

7. Herramientas de servicio

7.1. ConfigAssist

El ConfigAssist le guía en la configuración y primera puesta en servicio de su equipo de diagnóstico XENTRY. El procedimiento de configuración exacto figura en el capítulo 3, página 7.

El ConfigAssist ofrece las funciones siguientes:

1. Introducción al hardware
2. Configuración de red
3. Acoplamiento de XENTRY Diagnosis Pad 2 y VCI
4. Instalación de la StartKey
5. Configuración de XENTRY Update Service
6. Más información

7.2. Update Center

El Update Center sirve para instalar nuevas actualizaciones de software y cambiar entre los releases instalados, así como para instalar y administrar AddOns.

La vista de conjunto del Update Center le indica el release instalado actualmente, una comutación de releases disponible, el estado actual de actualización y el último AddOn instalado.

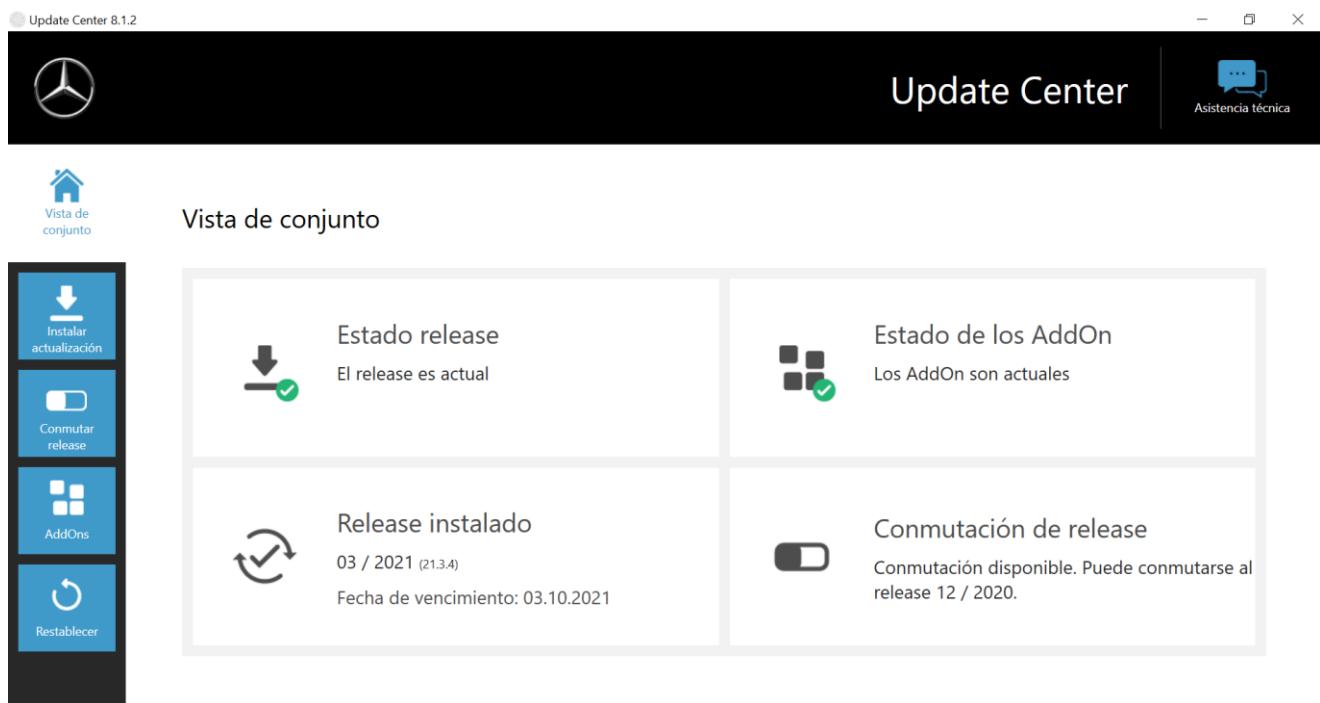


Ilustración 53: Vista de conjunto del Update Center

7.3. VCI Manager

El VCI Manager sirve para actualizar el firmware y recuperar el sistema del XENTRY Diagnosis VCI. La vista de conjunto que figura en "General" le muestra el estado de conexión entre el XENTRY Diagnosis Pad | Pad 2 y XENTRY Diagnosis VCI.



Ilustración 54: Icono del VCI Manager

7.3.1. Llamar VCI

Para comprobar la conexión entre el XENTRY Diagnosis Pad 2 y el VCI o simplemente para constatar qué VCI está acoplado con el XENTRY Diagnosis Pad, puede utilizar la función "Llamar VCI".

⚠️ Tenga en cuenta que esta función sólo está disponible una vez que haya acoplado entre sí el XENTRY Diagnosis Pad 2 y el VCI.

Para llamar al VCI, abra el VCI Manager a través del acceso directo en el escritorio de su XENTRY Diagnosis Pad 2. En la página de la vista de conjunto se le muestra el XENTRY Diagnosis VCI actualmente acoplado. Allí se encuentra el botón "Llamar VCI". Si hace clic en dicho botón, el VCI acoplado pitará.

⚠️ Tenga en cuenta que el VCI no dispone de alimentación de corriente propia. Esto significa que solo puede accederse a VCI cuando está conectado a una fuente de corriente. Esto puede realizarse por medio de un cable OBD a un vehículo o por cable de conexión USB en el XENTRY Diagnosis Pad 2.

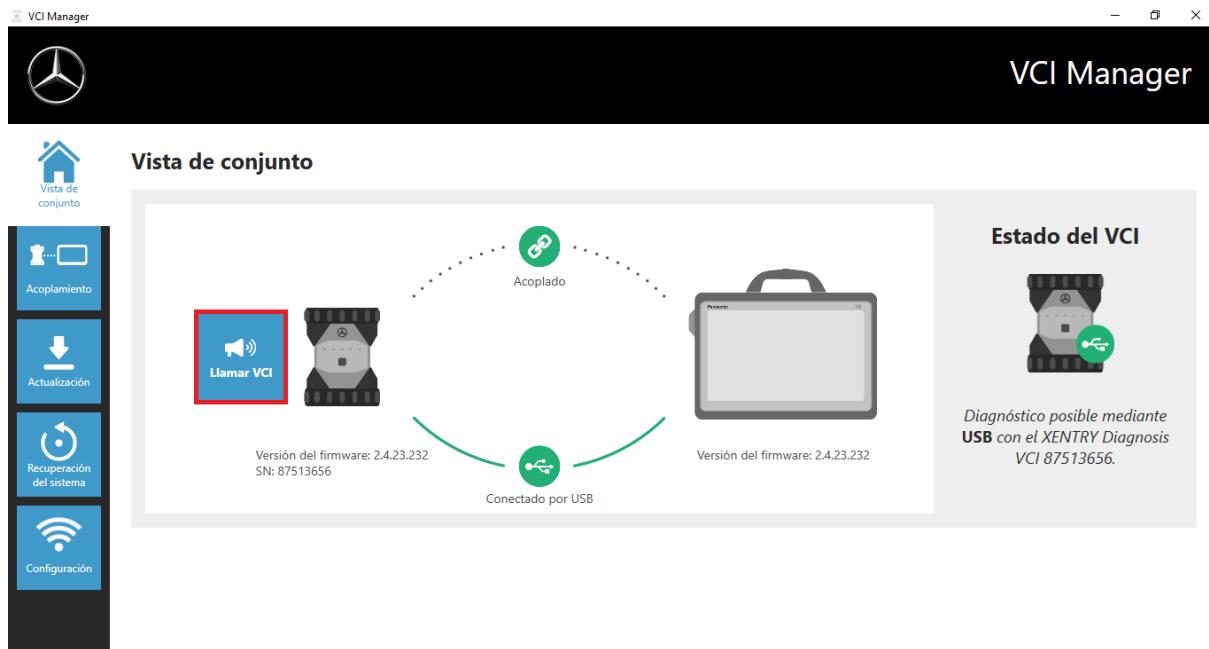


Ilustración 55: Llamada del VCI

7.3.2. Actualización del firmware del XENTRY Diagnosis VCI

Después de actualizar el XENTRY Diagnosis Pad 2 puede ser necesario actualizar el firmware del XENTRY Diagnosis VCI. Esto se puede visualizar, entre otros aspectos, en la página de la vista de conjunto del VCI Manager:

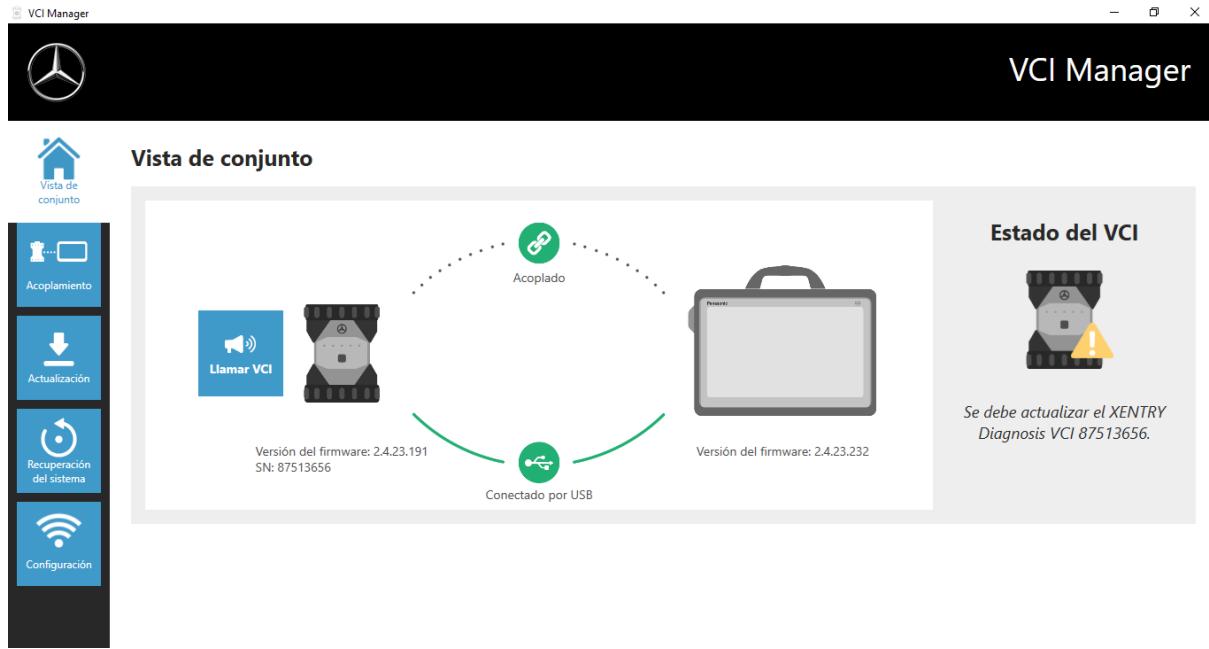


Ilustración 56: Indicación de actualización

Haga clic en la opción de menú "Actualización" en el VCI Manager y después en el botón "Iniciar actualización".



Ilustración 57: Iniciar actualización

Mientras se está realizando la actualización, tenga en cuenta que la conexión USB entre el XENTRY Diagnosis Pad y el VCI no debe interrumpirse.

Tras finalizar la actualización puede trabajar como de costumbre con su XENTRY Diagnosis Kit 4.

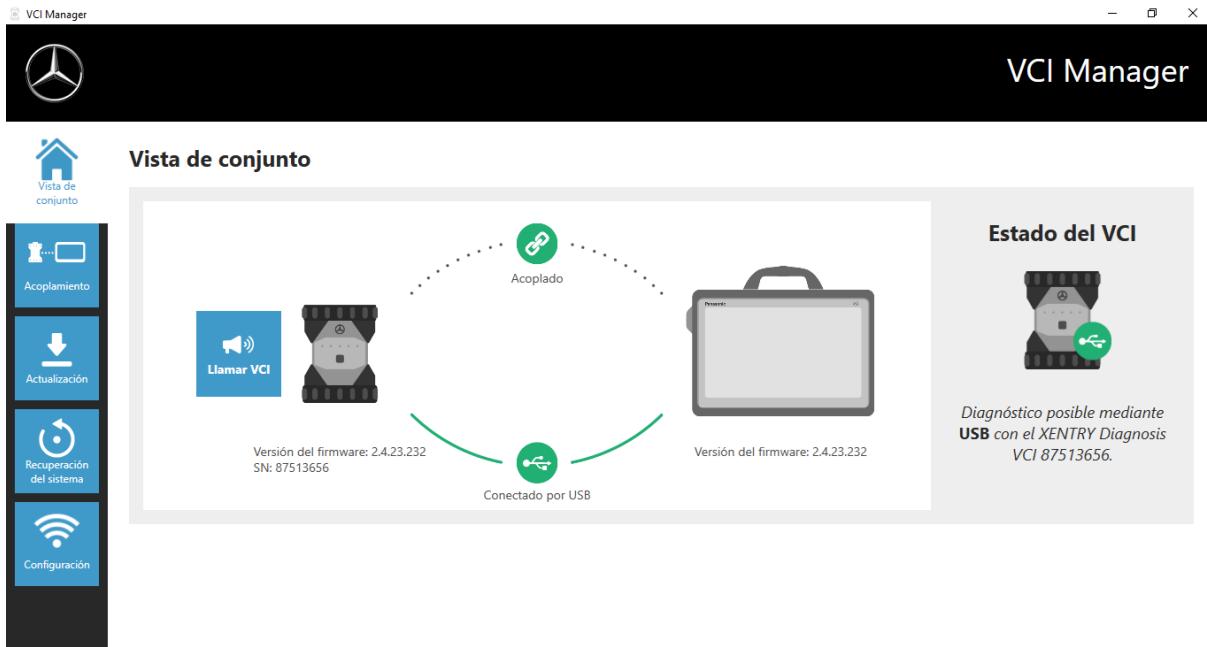


Ilustración 58: Confirmación de la actualización del firmware

7.3.3.Recuperación del sistema XENTRY Diagnosis VCI

⚠ Atención: ¡Realice la recuperación del sistema únicamente si así se lo indica el User Help Desk de diagnóstico!

Con esta función se adapta la versión de firmware del XENTRY Diagnosis VCI a la versión de firmware correspondiente del XENTRY Diagnosis Pad. Esta función de conmutación de releases se describe en el capítulo 4.3.3.

Se requiere una recuperación del sistema solo si ha comutado el release del XENTRY Diagnosis Pad a una versión anterior y se necesita reducir la versión de firmware del XENTRY Diagnosis VCI.

Para efectuar la recuperación del sistema haga clic en el botón para la recuperación del sistema de VCI Manager. Conecte el XENTRY Diagnosis VCI con el XENTRY Diagnosis Pad mediante el cable de conexión USB.



Ilustración 59: Recuperación del sistema del XENTRY Diagnosis VCI

El XENTRY Diagnosis VCI debe encontrarse en el modo de recuperación del sistema. Para ello, extraiga la cubierta de goma del XENTRY Diagnosis VCI con el símbolo WLAN estampado y pulse la tecla de recuperación del sistema durante 3 segundos. El LED rojo situado debajo del símbolo del triángulo debe iluminarse ahora. A continuación, pulse "Aceptar".

⚠ Durante la recuperación del sistema, tenga en cuenta que la conexión entre el XENTRY Diagnosis Pad y el XENTRY Diagnosis VCI no debe interrumpirse.

7.3.4 Canal WLAN

En casos excepcionales, pueden interferir entre sí los canales WLAN dentro del taller. Si es el caso de su taller, tiene la posibilidad de configurar manualmente el canal WLAN entre XENTRY Diagnosis Pad y VCI.

Para ello seleccione la opción de menú "Canal WLAN" y haga clic en el botón "Configuración manual de WLAN".

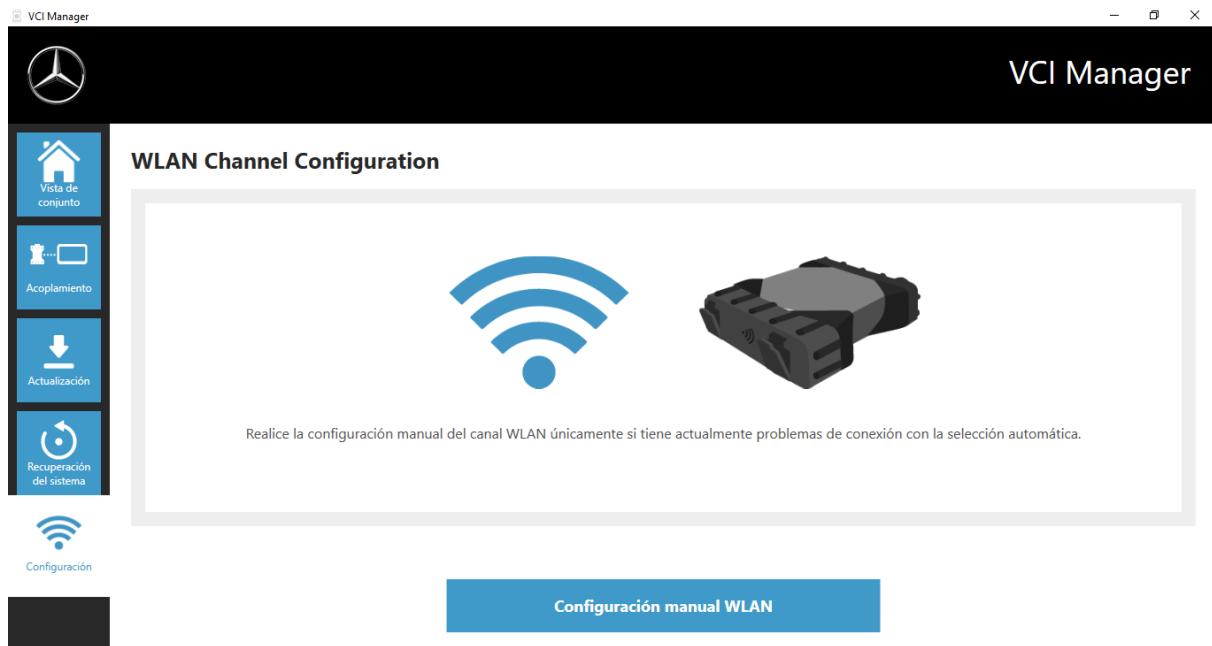


Ilustración 60: Configuración del canal WLAN

7.4. PDF Center

Con PDF Center tiene usted la posibilidad de

- transferir documentos a determinadas impresoras,
- de guardarlos en una ruta de almacenamiento que haya definido,
- de recopilarlos en un archivo,
- y de exportarlos.

La forma más fácil es definir una vez en la configuración de PDF Center qué acciones se deben llevar a cabo de forma predeterminada al crear un documento PDF.

Novedades con PDF Center y la actualización de release 03/2020

Tenga en cuenta las siguientes indicaciones:

Se ha adaptado la función "Imprimir en archivo" de XENTRY Diagnosis y DAS:

- Las carpetas "DASPrints" y "XDprint" ya no se utilizan.
- Se utiliza la carpeta de trabajo del PDF Center.

Los talleres que ya hayan trabajado previamente con Diagnosis PDF Printer, notarán el siguiente cambio: el guardado de sus documentos se repetirá hasta que haya tenido éxito. Esto significa que puede apagar el sistema de diagnóstico XENTRY o sacarlo de su red en cualquier momento. Tan pronto como la ruta de almacenamiento vuelva a estar disponible, se intentará guardar el documento. Puede ver el estado respectivo de la nueva representación en la primera pestaña.

Se solicita a los talleres que previamente no hayan trabajado con Diagnosis PDF Printer, que lo hagan con efecto inmediato.

Configure PDF Center de acuerdo según sus deseos y transfiera los documentos de las actualizaciones de release anteriores, si lo desea, a esta estructura. Todos los documentos PDF nuevos se pueden guardar automáticamente en esta estructura. También recomendamos esto para talleres que imprimen en papel. Con el PDF Center se pueden hacer ambas cosas de forma automática.

7.5. Support Tool

Abra la Support Tool con el acceso directo situado en el escritorio:

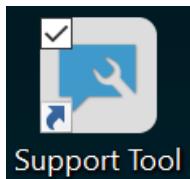


Ilustración 61: Icono de la Support Tool

Después de iniciar la Support Tool, la pestaña "Tique XSF" ya está seleccionada. Esta página le asiste en la creación de un tique XSF.

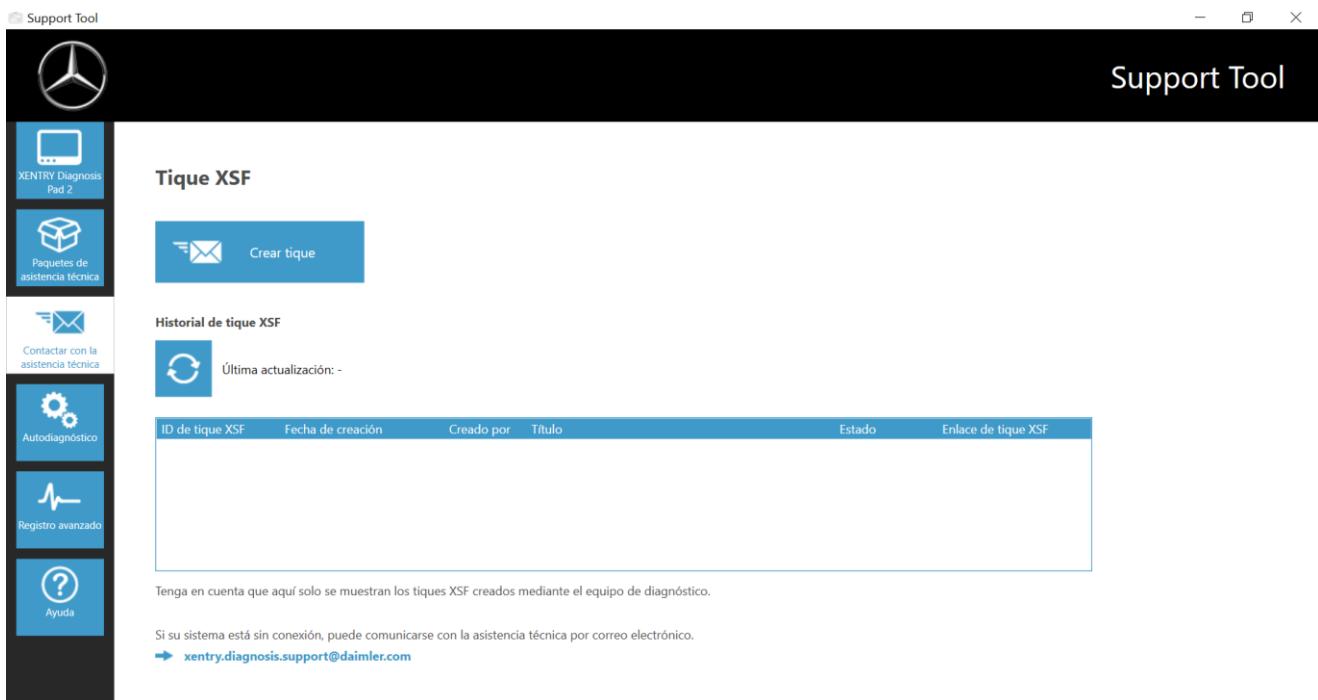


Ilustración 62: Creación de tiques XSF

- En la opción "Autodiagnóstico" se muestra la disponibilidad del servidor back-end
- El User Help Desk de diagnóstico puede pedirle que modifique el "Registro avanzado"; seleccione para ello esta opción
- En "Ayuda", la opción inferior de la barra de navegación, encontrará enlaces a la oferta online, documentos de ayuda, instrucciones y las Release Notes.

Los paquetes de soporte creados se encuentran en la biblioteca "Diagnosis Files" (archivos de diagnóstico), abajo del todo en el área "paquetes". El acceso directo para ello se encuentra en el escritorio de su XENTRY Diagnosis Pad 2.

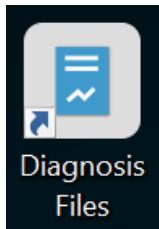


Ilustración 63: Icono de la biblioteca "Diagnosis Files"

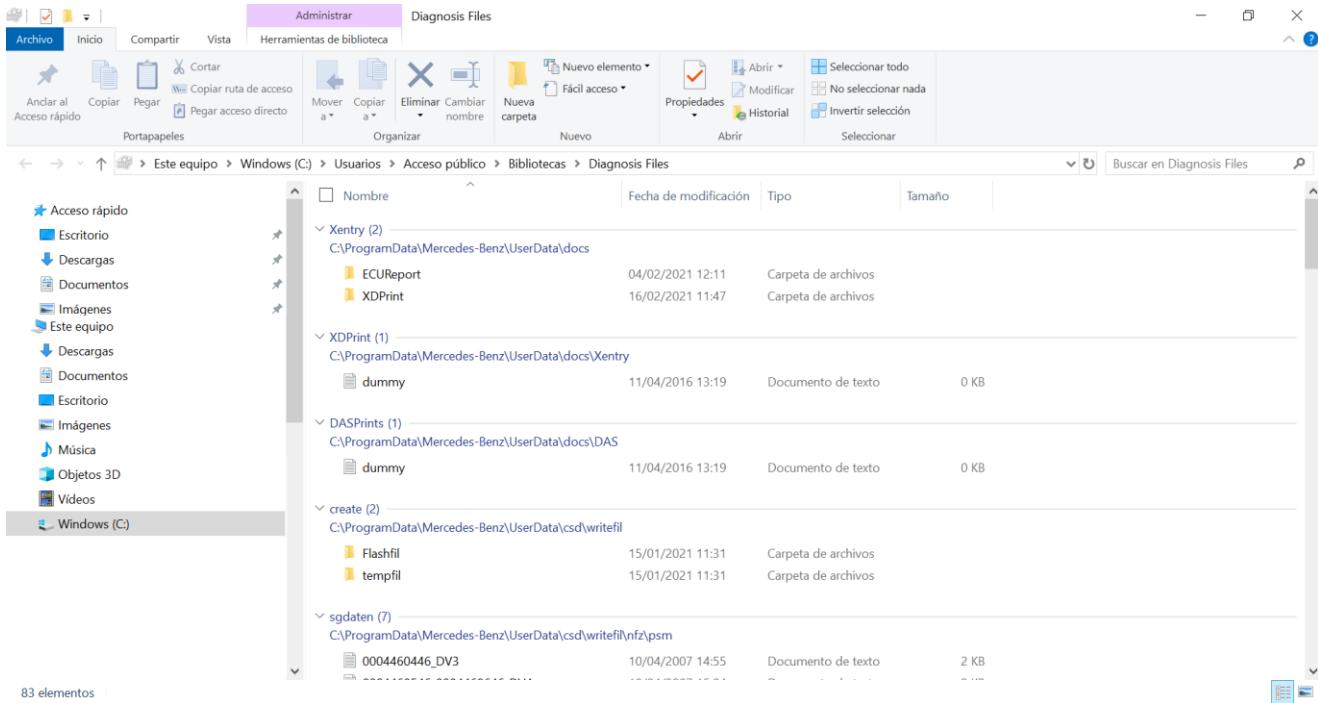


Ilustración 64: Lugar de ubicación de paquetes de asistencia

7.6. VCI Monitor

El VCI Monitor muestra la calidad de la conexión entre el XENTRY Diagnosis Pad y el XENTRY Diagnosis VCI.

La herramienta "VCI Monitor" muestra los siguientes estados:

Icono	Estado/causa	Descripción	Remedio
	VCI no acoplado	<ul style="list-style-type: none"> ▪ VCI no acoplado 	<ul style="list-style-type: none"> ▪ Acople VCI
	VCI no accesible (mediante WLAN)	<ul style="list-style-type: none"> ▪ VCI no conectado mediante USB ▪ VCI no visible mediante WLAN 	<ul style="list-style-type: none"> ▪ Conecte VCI a la tensión
	"Acoplamiento perdido"	<ul style="list-style-type: none"> ▪ VCI no conectado mediante USB ▪ VCI visible mediante WLAN ▪ Falta el acoplamiento 	<ul style="list-style-type: none"> ▪ Conecte VCI con un cable de conexión USB ▪ Acople el VCI a través del VCI Manager
	Firmware del VCI más antiguo que el software del PC	<ul style="list-style-type: none"> ▪ El firmware de VCI es demasiado antiguo 	<ul style="list-style-type: none"> ▪ Actualice VCI a través de VCI Manager
	Software del PC más antiguo que el firmware del VCI	<ul style="list-style-type: none"> ▪ VCI no conectado mediante USB ▪ VCI visible mediante WLAN ▪ Software de PC demasiado antiguo 	<ul style="list-style-type: none"> ▪ Cambie a una versión anterior del firmware de VCI realizando la "actualización" en VCI Manager
	VCI en la recuperación del sistema	<ul style="list-style-type: none"> ▪ VCI conectado mediante USB ▪ VCI en modo de recuperación del sistema 	<ul style="list-style-type: none"> ▪ Realice la recuperación del sistema en el VCI Manager
	VCI en uso	<ul style="list-style-type: none"> ▪ VCI en uso con una aplicación (distinta) 	
	VCI en uso a través de WLAN	<ul style="list-style-type: none"> ▪ VCI en uso con una aplicación (distinta) mediante WLAN 	
	VCI accesible mediante USB	<ul style="list-style-type: none"> ▪ VCI conectado por cable de conexión USB 	
	VCI accesible mediante WLAN	<ul style="list-style-type: none"> ▪ VCI accesible mediante WLAN ▪ Calidad de la conexión de la WLAN visible mediante barras 	
	Adaptador WLAN no funciona	<ul style="list-style-type: none"> ▪ No se puede establecer la comunicación entre el VCI y el Pad mediante WLAN 	<ul style="list-style-type: none"> ▪ Haga clic en el adaptador WLAN mediante la ventana que se muestra "Restablecer adaptador WLAN" o haciendo clic con el botón secundario del ratón en la indicación de estado y allí en "Restablecer dispositivo WiFi..."
	VCI en uso a través de conexión por cable	<ul style="list-style-type: none"> ▪ VCI en uso con una aplicación (distinta) 	
	Modo avión	<ul style="list-style-type: none"> ▪ El dispositivo WiFi está desactivado. 	<ul style="list-style-type: none"> ▪ Desactive el modo avión ▪ Active el dispositivo WiFi
	VCI sobrecalentado	<ul style="list-style-type: none"> ▪ El dispositivo WiFi está desactivado a temperaturas superiores a 65 °C 	<ul style="list-style-type: none"> ▪ Utilizar un cable de conexión USB con temperaturas de hasta 85 °C. ▪ Utilizar VCI con temperaturas ambientes más frías

Tabla 2: Estado del VCI Monitor

8. Servicio Postventa y asistencia técnica

Para la creación de un tique XSF recomendamos la utilización de una herramienta para creación de tiques. Puede iniciarla directamente dentro del XENTRY Diagnosis Software. Para ello, haga clic en el símbolo de diálogo en la parte superior derecha.

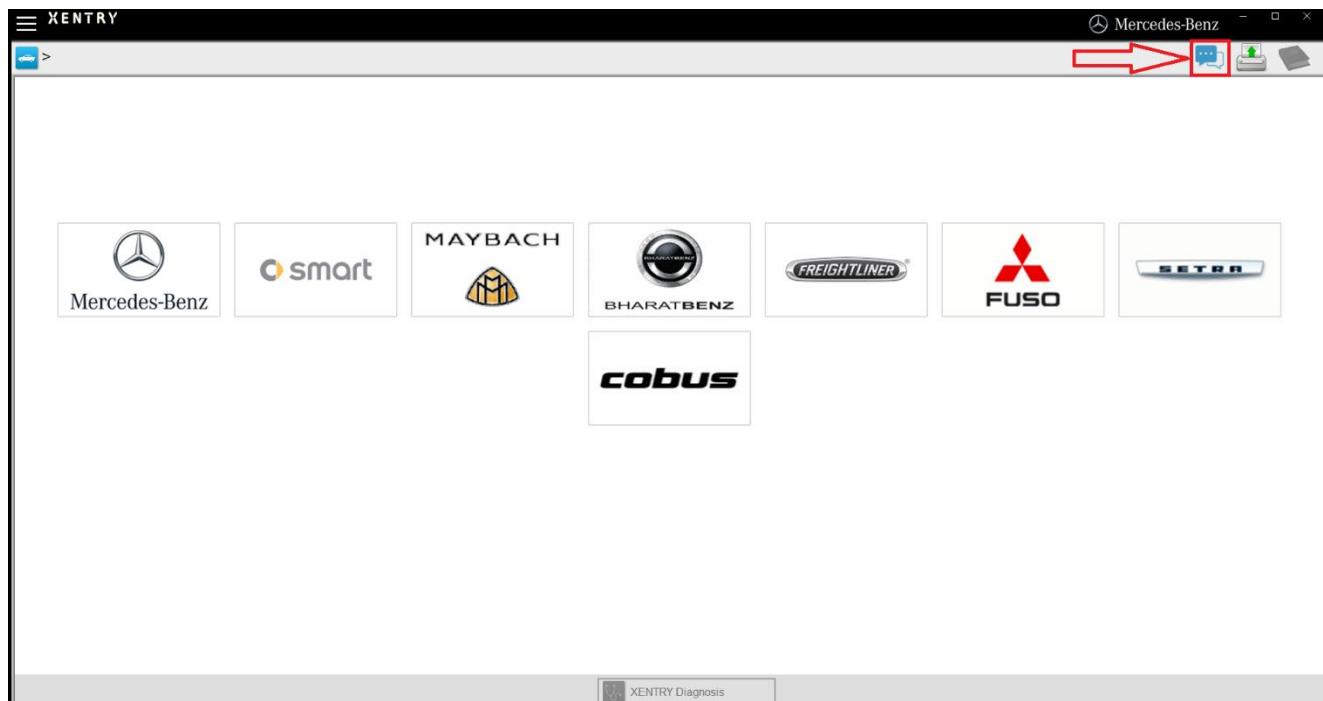


Ilustración 71: Crear tique XSF en XENTRY Diagnosis

Regístrese dado el caso en la siguiente ventana y seleccione los componentes sobre los que desea crear el tique XSF.

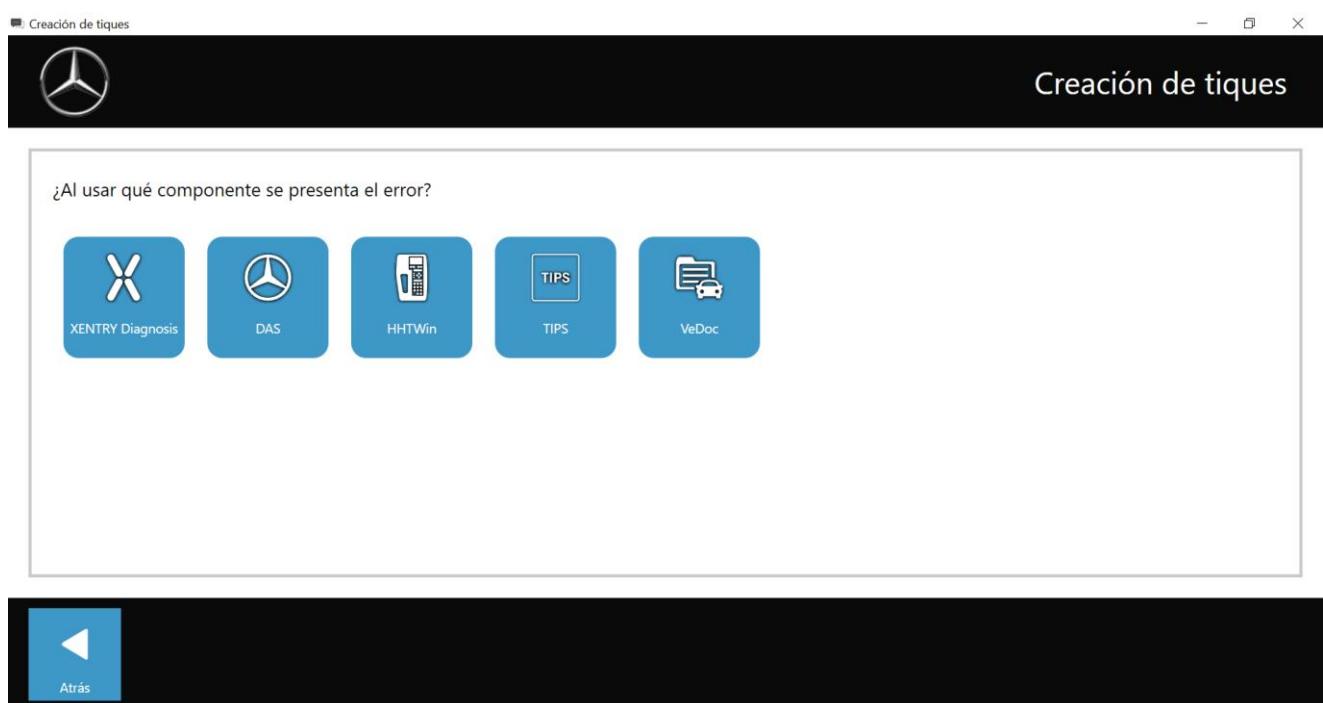


Ilustración 65: Selección de componentes tique XSF

Conteste todas las preguntas que se le formulen en el proceso en marcha.

Añada capturas de pantalla o vídeos. El paquete de asistencia técnica adecuado se crea y se adjunta automáticamente al enviar el tique XSF.

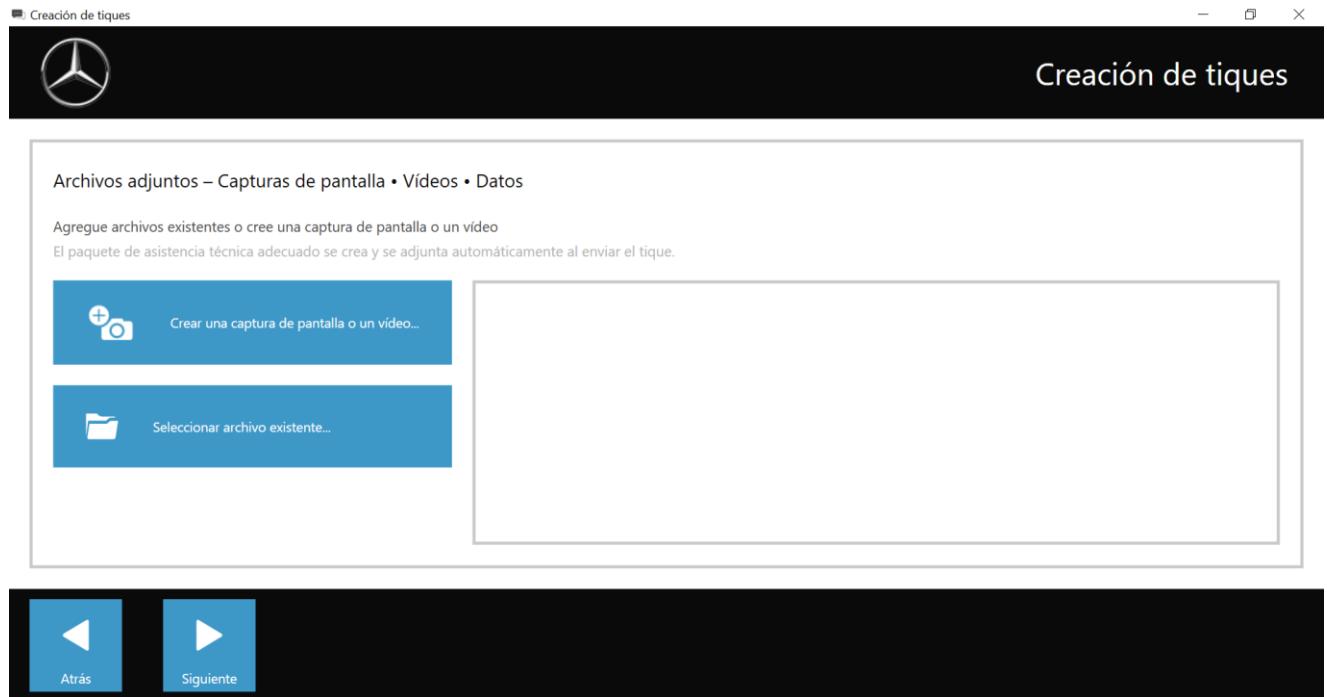


Ilustración 66: Anexos de archivo tique XSF

9. Directrices de licencia de Windows 10 IoT LTSC Enterprise

Updated May 2020

MICROSOFT SOFTWARE LICENSE TERMS (SAMPLE TEMPLATE)

WINDOWS 10 IOT ENTERPRISE & MOBILE (ALL EDITIONS)

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By accepting this agreement or using the software, you agree to all of these terms, and consent to the transmission of certain information during activation and during your use of the software as per the privacy statement described in Section 3. If you do not accept and comply with these terms, you may not use the software or its features. You may contact the device manufacturer or installer, or your retailer if you purchased the software directly, to determine its return policy and return the software or device for a refund or credit under that policy. You must comply with that policy, which might require you to return the software with the entire device on which the software is installed for a refund or credit, if any.

1. Overview.
 - a. **Applicability.** This agreement applies to the Windows software that is preinstalled on your device, or acquired from a retailer and installed by you, the media on which you received the software (if any), any fonts, icons, images or sound files included with the software, and also any Microsoft updates, upgrades, supplements or services for the software, unless other terms come with them. It also applies to Windows apps developed by Microsoft that provide functionality such as mail, calendar, contacts, music and news that are included with and are a part of Windows. If this agreement contains terms regarding a feature or service not available on your device, then those terms do not apply.
 - b. **Additional terms.** Depending on your device's capabilities, how it is configured, and how you use it, additional Microsoft and third party terms may apply to your use of certain features, services and apps.
 - (i) Some Windows apps provide an access point to, or rely on, online services, and the use of those services is sometimes governed by separate terms and privacy policies, such as the Microsoft Services Agreement at (aka.ms/msa). You can view these terms and policies by looking at the service terms of use or the app's settings, as applicable; please read them. The services may not be available in all regions.
 - (ii) The manufacturer or installer may also preinstall apps, which will be subject to separate license terms.

- (iii) The software may include third party software such as Adobe Flash Player that is licensed under its own terms. You agree that your use of Adobe Flash Player is governed by the license terms for Adobe Systems Incorporated at (aka.ms/adobeflash). Adobe and Flash are either registered trademarks or trademarks of Adobe Systems Incorporated in the United States and/or other countries.
- (iv) The software may include third party programs that are licensed to you under this agreement, or under their own terms. License terms, notices and acknowledgements, if any, for the third party program can be viewed at (aka.ms/thirdpartynotices).

2. Installation and Use Rights.

- a. **License.** The software license is permanently assigned to the device with which you acquired the software. You may only use the software on that device.
- b. **Device.** In this agreement, “device” means a physical hardware system) with an internal storage device capable of running the software. A hardware partition or blade is considered to be a device.
- c. **Restrictions.** The manufacturer or installer and Microsoft reserve all rights (such as rights under intellectual property laws) not expressly granted in this agreement. For example, this license does not give you any right to, and you may not:
 - (i) use or virtualize features of the software separately;
 - (ii) publish, copy (other than the permitted backup copy), rent, lease, or lend the software;
 - (iii) transfer the software;
 - (iv) work around any technical restrictions or limitations in the software;
 - (v) use the software as server software, for commercial hosting, make the software available for simultaneous use by multiple users over a network, install the software on a server and allow users to access it remotely, or install the software on a device for use only by remote users;
 - (vi) reverse engineer, decompile, or disassemble the software, or attempt to do so, except and only to the extent that the foregoing restriction is (a) permitted by applicable law; (b) permitted by licensing terms governing the use of open source components that may be included with the software; or (c) required to debug changes to any libraries licensed under the GNU Lesser General Public License which are included with and linked to by the software; and
 - (vii) when using Internet-based features you may not use those features in any way that could interfere with anyone else’s use of them, or to try to gain access to or use any service, data, account, or network, in an unauthorized manner.
- d. **Multi use scenarios.**
 - (i) Multiple versions. If when acquiring the software, you were provided with multiple versions (such as 32-bit and 64-bit versions), you may install and activate only one of those versions at a time.
 - (ii) Multiple or pooled connections. Hardware or software you use to multiplex or pool connections, or reduce the number of devices or users that access or use the software, does not reduce the number of licenses you need. You may only use such hardware or software if you have a license for each instance of the software you are using.
 - (iii) Device connections. You may allow up to 20 other devices to access the software installed on the licensed device for the purpose of using the following software features: file services, print services, Internet information services, and Internet connection sharing and telephony services on the licensed device. The 20 connection limit applies to devices that access the software indirectly through “multiplexing” or other software or hardware that pools connections. You may allow any number of devices to access the software on the licensed device to synchronize data between devices. This section does not mean, however, that you have the right to install the software, or use the primary function of the software (other than the features listed in this section), on any of these other devices.
 - (iv) Remote access. Users may access the licensed device from another device using remote access technologies, but only on devices separately licensed to run the same or higher edition of this software.
 - (v) Remote assistance. You may use remote assistance technologies to share an active session without obtaining any additional licenses for the software. Remote assistance allows one user to connect directly to another user’s computer, usually to correct problems.
 - (vi) POS application. If the software is installed on a retail point of service device, you may use the software with a point of service application (“POS Application”). A POS Application is a software

- application which provides only the following functions: (i) process sales and service transactions, scan and track inventory, record and/or transmit customer information, and perform related management functions, and/or (ii) provide information directly and indirectly to customers about available products and services. You may use other programs with the software as long as the other programs: (i) directly support the manufacturer's specific use for the device, or (ii) provide system utilities, resource management, or anti-virus or similar protection. For clarification purposes, an automated teller machine ("ATM") is not a retail point of service device.
- (vii) Cloud Computing Devices. If your device uses Internet browsing functionality to connect to and access cloud hosted applications: (i) no desktop functions may run locally on the device, and (ii) any files that result from the use of the desktop functions may not be permanently stored on the system. "Desktop functions," as used in this agreement, means a consumer or business task or process performed by a computer or computing device. This includes but is not limited to email, word processing, spreadsheets, database, scheduling, network or internet browsing and personal finance.
 - (viii) Desktop Functions. If your system performs desktop functions, then you must ensure that they: (i) are only used to support the application, and (ii) operate only when used with the application.

e. Windows 10 IoT Enterprise Features for Development and Testing Only.

1. Device Health Attestation. You may only implement Device Health Attestation in a commercial use if you execute a Microsoft Windows IoT Core Services Agreement at:
<https://azure.microsoft.com/en-us/services/windows-10-iot-core/>.

f. Specific Use. The manufacturer designed the licensed device for a specific use. You may only use the software for that use.

3. **Privacy; Consent to Use of Data.** Your privacy is important to us. Some of the software features send or receive information when using those features. Many of these features can be switched off in the user interface, or you can choose not to use them. By accepting this agreement and using the software you agree that Microsoft may collect, use, and disclose the information as described in the Microsoft Privacy Statement available at (aka.ms/privacy), and as may be described in the user interface associated with the software features.
4. **Authorized Software and Activation.** You are authorized to use this software only if you are properly licensed and the software has been properly activated with a genuine product key or by other authorized method. When you connect to the Internet while using the software, the software will automatically contact Microsoft or its affiliate to confirm the software is genuine and the license is associated with the licensed device. You can also activate the software manually by Internet or telephone. In either case, transmission of certain information will occur, and Internet, telephone and SMS service charges may apply. During activation (or reactivation that may be triggered by changes to your device's components), the software may determine that the installed instance of the software is counterfeit, improperly licensed or includes unauthorized changes. If activation fails the software will attempt to repair itself by replacing any tampered Microsoft software with genuine Microsoft software. You may also receive reminders to obtain a proper license for the software. Successful activation does not confirm that the software is genuine or properly licensed. You may not bypass or circumvent activation. To help determine if your software is genuine and whether you are properly licensed, see (aka.ms/genuine). Certain updates, support, and other services might only be offered to users of genuine Microsoft software.
5. **Updates.** You may obtain updates only from Microsoft or authorized sources, and Microsoft may need to update your system to provide you with those updates. The software periodically checks for system and app updates, and may download and install them for you. To the extent automatic updates are enabled on your device, by accepting this agreement, you agree to receive these types of automatic updates without any additional notice.
6. **Geographic and Export Restrictions.** If your software is restricted for use in a particular geographic region, then you may activate the software only in that region. You must also comply with all domestic and international export laws and regulations that apply to the software, which include restrictions on destinations, end users, and end use. For further information on geographic and export restrictions, visit (aka.ms/exporting).
7. **Support and Refund Procedures.** For the software generally, contact the device manufacturer or installer for support options. Refer to the support number provided with the software. For updates and supplements obtained directly from Microsoft, Microsoft may provide limited support services for properly licensed software as described at (aka.ms/mssupport). If you are seeking a refund, contact the manufacturer or installer to determine its refund policies. You must comply with those policies, which might require you to return the software with the entire device on which the software is installed for a refund.
8. **Binding Arbitration and Class Action Waiver if You Live in (or if a Business Your Principal Place of Business is in) the United States.**

We hope we never have a dispute, but if we do, you and we agree to try for 60 days to resolve it informally. If we can't, you and we agree to binding individual arbitration before the American Arbitration Association ("AAA") under the Federal Arbitration Act ("FAA"), and not to sue in court in front of a judge or jury. Instead, a neutral arbitrator will decide and the arbitrator's decision will be final except for a limited right of appeal under the FAA. Class action lawsuits, class-wide arbitrations, private attorney-general actions, and any other proceeding where someone acts in a representative capacity aren't allowed. Nor is combining individual proceedings without the consent of all parties. "We," "our," and "us" includes Microsoft, the device manufacturer, and software installer.

- a. **Disputes covered—everything except IP.** The term "dispute" is as broad as it can be. It includes any claim or controversy between you and the manufacturer or installer, or you and Microsoft, concerning the software, its price, or this agreement, under any legal theory including contract, warranty, tort, statute, or regulation, **except disputes relating to the enforcement or validity of your, your licensors', our, or our licensors' intellectual property rights.**
- b. **Mail a Notice of Dispute first.** If you have a dispute and our customer service representatives can't resolve it, send a Notice of Dispute by U.S. Mail to the manufacturer or installer, ATTN: LEGAL DEPARTMENT. If your dispute is with Microsoft, mail it to Microsoft Corporation, ATTN: LCA ARBITRATION, One Microsoft Way, Redmond, WA 98052-6399. Tell us your name, address, how to contact you, what the problem is, and what you want. A form is available at (aka.ms/disputeform). We'll do the same if we have a dispute with you. After 60 days, you or we may start an arbitration if the dispute is unresolved.
- c. **Small claims court option.** Instead of mailing a Notice of Dispute, and if you meet the court's requirements, you may sue us in small claims court in your county of residence (or if a business your principal place of business) or our principal place of business—King County, Washington USA if your dispute is with Microsoft. We hope you'll mail a Notice of Dispute and give us 60 days to try to work it out, but you don't have to before going to small claims court.
- d. **Arbitration procedure.** The AAA will conduct any arbitration under its Commercial Arbitration Rules (or if you are an individual and use the software for personal or household use, or if the value of the dispute is \$75,000 USD or less whether or not you are an individual or how you use the software, its Consumer Arbitration Rules). For more information, see (aka.ms/adr) or call 1-800-778-7879. To start an arbitration, submit the form available at (aka.ms/arbitration) to the AAA; mail a copy to the manufacturer or installer (or to Microsoft if your dispute is with Microsoft). In a dispute involving \$25,000 USD or less, any hearing will be telephonic unless the arbitrator finds good cause to hold an in-person hearing instead. Any in-person hearing will take place in your county of residence (or if a business your principal place of business) or our principal place of business—King County, Washington if your dispute is with Microsoft. You choose. The arbitrator may award the same damages to you individually as a court could. The arbitrator may award declaratory or injunctive relief only to you individually to satisfy your individual claim.
- e. **Arbitration fees and payments.**
 - (i) Disputes involving \$75,000 USD or less. The manufacturer or installer (or Microsoft if your dispute is with Microsoft) will promptly reimburse your filing fees and pay the AAA's and arbitrator's fees and expenses. If you reject our last written settlement offer made before the arbitrator was appointed, your dispute goes all the way to an arbitrator's decision (called an "award"), and the arbitrator awards you more than this last written offer, the manufacturer or installer (or Microsoft if your dispute is with Microsoft) will: (1) pay the greater of the award or \$1,000 USD; (2) pay your reasonable attorney's fees, if any; and (3) reimburse any expenses (including expert witness fees and costs) that your attorney reasonably accrues for investigating, preparing, and pursuing your claim in arbitration. The arbitrator will determine the amounts unless you and we agree on them.
 - (ii) Disputes involving more than \$75,000 USD. The AAA rules will govern payment of filing fees and the AAA's and arbitrator's fees and expenses.
 - (iii) Disputes involving any amount. If you start an arbitration we won't seek our AAA or arbitrator's fees and expenses, or your filing fees we reimbursed, unless the arbitrator finds the arbitration frivolous or brought for an improper purpose. If we start an arbitration we will pay all filing, AAA, and arbitrator's fees and expenses. We won't seek our attorney's fees or expenses from you in any arbitration. Fees and expenses are not counted in determining how much a dispute involves.
- f. **Must file within one year.** You and we must file in small claims court or arbitration any claim or dispute (except intellectual property disputes – see Section 9.a.) within one year from when it first could be filed. Otherwise, it's permanently barred.

- g. **Severability.** If the class action waiver is found to be illegal or unenforceable as to all or some parts of a dispute, those parts won't be arbitrated but will proceed in court, with the rest proceeding in arbitration. If any other provision of Section 9 is found to be illegal or unenforceable, that provision will be severed but the rest of Section 9 still applies.
- h. **Conflict with AAA rules.** This agreement governs if it conflicts with the AAA's Commercial Arbitration Rules or Consumer Arbitration Rules.
- i. **Microsoft as party or third-party beneficiary.** If Microsoft is the device manufacturer or if you acquired the software from a retailer, Microsoft is a party to this agreement. Otherwise, Microsoft is not a party but is a third-party beneficiary of your agreement with the manufacturer or installer to resolve disputes through informal negotiation and arbitration.
9. **Governing Law.** The laws of the state or country where you live (or if a business where your principal place of business is located) govern all claims and disputes concerning the software, its price, or this agreement, including breach of contract claims and claims under state consumer protection laws, unfair competition laws, implied warranty laws, for unjust enrichment, and in tort, regardless of conflict of law principles. In the United States, the FAA governs all provisions relating to arbitration.
10. **Consumer Rights, Regional Variations.** This agreement describes certain legal rights. You may have other rights, including consumer rights, under the laws of your state or country. You may also have rights with respect to the party from which you acquired the software. This agreement does not change those other rights if the laws of your state or country do not permit it to do so. For example, if you acquired the software in one of the below regions, or mandatory country law applies, then the following provisions apply to you:
- a. **Australia.** References to "Limited Warranty" are references to the express warranty provided by Microsoft or the manufacturer or installer. This warranty is given in addition to other rights and remedies you may have under law, including your rights and remedies in accordance with the statutory guarantees under the Australian Consumer Law.
In this section, "goods" refers to the software for which Microsoft or the manufacturer or installer provides the express warranty. Our goods come with guarantees that cannot be excluded under the Australian Consumer Law. You are entitled to a replacement or refund for a major failure and compensation for any other reasonably foreseeable loss or damage. You are also entitled to have the goods repaired or replaced if the goods fail to be of acceptable quality and the failure does not amount to a major failure.
- b. **Canada.** You may stop receiving updates on your device by turning off Internet access. If and when you reconnect to the Internet, the software will resume checking for and installing updates.
- c. **Germany and Austria.**
- (i) **Warranty.** The properly licensed software will perform substantially as described in any Microsoft materials that accompany the software. However, the manufacturer or installer, and Microsoft, give no contractual guarantee in relation to the licensed software.
 - (ii) **Limitation of Liability.** In case of intentional conduct, gross negligence, claims based on the Product Liability Act, as well as, in case of death or personal or physical injury, the manufacturer or installer, or Microsoft is liable according to the statutory law.
- Subject to the preceding sentence, the manufacturer or installer, or Microsoft will only be liable for slight negligence if the manufacturer or installer or Microsoft is in breach of such material contractual obligations, the fulfillment of which facilitate the due performance of this agreement, the breach of which would endanger the purpose of this agreement and the compliance with which a party may constantly trust in (so-called "cardinal obligations"). In other cases of slight negligence, the manufacturer or installer or Microsoft will not be liable for slight negligence.
- d. **Other regions.** See (aka.ms/variations) for a current list of regional variations
11. Additional Notices.
- a. **Networks, data and Internet usage.** Some features of the software and services accessed through the software may require your device to access the Internet. Your access and usage (including charges) may be subject to the terms of your cellular or internet provider agreement. Certain features of the software may help you access the Internet more efficiently, but the software's usage calculations may be different from your service provider's measurements. You are always responsible for (i) understanding and complying with the terms of your own plans and agreements, and (ii) any issues arising from using or accessing networks, including public/open networks. You may use the software to connect to networks, and to share access information about those networks, only if you have permission to do so.
- b. **H.264/AVC and MPEG-4 visual standards and VC-1 video standards.** The software may include H.264/MPEG-4 AVC and/or VC-1 decoding technology. MPEG LA, L.L.C. requires this notice:

THIS PRODUCT IS LICENSED UNDER THE AVC, THE VC-1, AND THE MPEG-4 PART 2 VISUAL PATENT PORTFOLIO LICENSES FOR THE PERSONAL AND NON-COMMERCIAL USE OF A CONSUMER TO (i) ENCODE VIDEO IN COMPLIANCE WITH THE ABOVE STANDARDS (“VIDEO STANDARDS”) AND/OR (ii) DECODE AVC, VC-1, AND MPEG-4 PART 2 VIDEO THAT WAS ENCODED BY A CONSUMER ENGAGED IN A PERSONAL AND NONCOMMERCIAL ACTIVITY AND/OR WAS OBTAINED FROM A VIDEO PROVIDER LICENSED TO PROVIDE SUCH VIDEO. NO LICENSE IS GRANTED OR SHALL BE IMPLIED FOR ANY OTHER USE. ADDITIONAL INFORMATION MAY BE OBTAINED FROM MPEG LA, L.L.C. SEE WWW.MPEGLA.COM

- c. Malware protection. Microsoft cares about protecting your device from malware. The software will turn on malware protection if other protection is not installed or has expired. To do so, other antimalware software will be disabled or may have to be removed.
- 12. Entire Agreement. This agreement (together with the printed paper license terms or other terms accompanying any software supplements, updates, and services that are provided by the manufacturer or installer, or Microsoft, and that you use), and the terms contained in web links listed in this agreement, are the entire agreement for the software and any such supplements, updates, and services (unless the manufacturer or installer, or Microsoft, provides other terms with such supplements, updates, or services). You can review this agreement after your software is running by going to (aka.ms/useterms) or going to Settings - System - About within the software. You can also review the terms at any of the links in this agreement by typing the URLs into a browser address bar, and you agree to do so. You agree that you will read the terms before using the software or services, including any linked terms. You understand that by using the software and services, you ratify this agreement and the linked terms. There are also informational links in this agreement. The links containing notices and binding terms are:
 - Windows 10 Privacy Statement (aka.ms/privacy)
 - Microsoft Services Agreement (aka.ms/msa)
 - Adobe Flash Player License Terms (aka.ms/adobeflash)

NO WARRANTY

THE SOFTWARE ON YOUR DEVICE (INCLUDING THE APPS) IS LICENSED “AS IS.” TO THE MAXIMUM EXTENT PERMITTED BY YOUR LOCAL LAWS, YOU BEAR THE ENTIRE RISK AS TO THE SOFTWARE’S QUALITY AND PERFORMANCE. SHOULD IT PROVE DEFECTIVE, YOU ASSUME THE ENTIRE COST OF ALL SERVICING OR REPAIR. NEITHER THE DEVICE MANUFACTURER NOR MICROSOFT GIVES ANY EXPRESS WARRANTIES, GUARANTEES, OR CONDITIONS FOR THE SOFTWARE. TO THE EXTENT PERMITTED UNDER YOUR LOCAL LAWS, THE MANUFACTURER AND MICROSOFT EXCLUDE ALL IMPLIED WARRANTIES AND CONDITIONS, INCLUDING THOSE OF MERCHANTABILITY, QUALITY, FITNESS FOR A PARTICULAR PURPOSE, AND NON-INFRINGEMENT. YOU MAY HAVE ADDITIONAL CONSUMER RIGHTS OR STATUTORY GUARANTEES UNDER LOCAL LAWS THAT THESE TERMS CANNOT CHANGE.

IF YOUR LOCAL LAWS IMPOSE A WARRANTY, GUARANTEE, OR CONDITION EVEN THOUGH THIS AGREEMENT DOES NOT, ITS TERM IS LIMITED TO 90 DAYS FROM WHEN THE FIRST USER ACQUIRES THE SOFTWARE. IF THE MANUFACTURER OR MICROSOFT BREACHES SUCH A WARRANTY, GUARANTEE, OR CONDITION, YOUR SOLE REMEDY, AT THE MANUFACTURER’S OR MICROSOFT’S ELECTION, IS (I) REPAIR OR REPLACEMENT OF THE SOFTWARE AT NO CHARGE, OR (II) RETURN OF THE SOFTWARE (OR AT ITS ELECTION THE DEVICE ON WHICH THE SOFTWARE WAS INSTALLED) FOR A REFUND OF THE AMOUNT PAID, IF ANY. THESE ARE YOUR ONLY REMEDIES FOR BREACH OF A WARRANTY, GUARANTEE, OR CONDITION YOUR LOCAL LAWS IMPOSE.

TO THE EXTENT NOT PROHIBITED BY YOUR LOCAL LAWS, IF YOU HAVE ANY BASIS FOR RECOVERING DAMAGES, YOU CAN RECOVER FROM THE MANUFACTURER OR MICROSOFT ONLY DIRECT DAMAGES UP TO THE AMOUNT YOU PAID FOR THE SOFTWARE (OR UP TO \$50 USD IF YOU ACQUIRED THE SOFTWARE FOR NO CHARGE). YOU WILL NOT, AND WAIVE ANY RIGHT TO, SEEK TO RECOVER ANY OTHER DAMAGES OR REMEDY, INCLUDING LOST PROFITS AND DIRECT, CONSEQUENTIAL, SPECIAL, INDIRECT, OR INCIDENTAL DAMAGES, UNDER ANY PART OF THIS AGREEMENT OR UNDER ANY THEORY. THIS LIMITATION APPLIES TO (I) ANYTHING RELATED TO THIS AGREEMENT, THE SOFTWARE (INCLUDING THE APPS), THE DEVICE, SERVICES, CORRUPTION OR LOSS OF DATA, FAILURE TO TRANSMIT OR RECEIVE DATA, CONTENT (INCLUDING CODE) ON THIRD PARTY INTERNET SITES OR THIRD PARTY PROGRAMS, AND (II) CLAIMS FOR BREACH OF CONTRACT, WARRANTY, GUARANTEE, OR CONDITION; STRICT LIABILITY, NEGLIGENCE, OR OTHER TORT; VIOLATION OF A STATUTE OR REGULATION; UNJUST ENRICHMENT; OR UNDER ANY OTHER THEORY.

THE DAMAGE EXCLUSIONS AND REMEDY LIMITATIONS IN THIS AGREEMENT APPLY EVEN IF YOU HAVE NO REMEDY (THE SOFTWARE IS LICENSED “AS IS”), IF REPAIR, REPLACEMENT, OR A REFUND (IF REQUIRED BY YOUR LOCAL LAW) DOES NOT FULLY COMPENSATE YOU FOR ANY LOSSES, IF THE MANUFACTURER OR MICROSOFT KNEW OR SHOULD HAVE KNOWN ABOUT THE POSSIBILITY OF THE DAMAGES, OR IF THE REMEDY FAILS OF ITS ESSENTIAL PURPOSE.

Check with your device manufacturer to determine if your device is covered by a warranty.

10. Lease Agreement for Microsoft Software Products



Agreement for leasing or renting certain Microsoft Software Products

IMPORTANT—READ CAREFULLY: This agreement (“Agreement”) is between you, a legal entity (“COMPANY”), and Microsoft Corporation or one of its affiliates (“Microsoft”). This Agreement grants COMPANY limited rights to: (i) lease to third parties personal computers (“PCs”) that COMPANY acquires with the original equipment manufacturer (“OEM”) versions of the Windows 10 Pro/Pro for Workstations, Windows 8 Pro, or Windows 7 Professional desktop operating system, and, as applicable, Microsoft Office 2019, Microsoft Office 2016, Microsoft Office 2013, or Microsoft Office 2010 (“Microsoft Software Products”) preinstalled by a PC manufacturer (“OEM”), and (ii) rent the OEM and Volume Licensing versions of certain Microsoft Software Products. By exercising rights under this Agreement, COMPANY agrees to its terms. If COMPANY does not agree, COMPANY may not lease PCs with Microsoft Software Products preinstalled and may not rent Microsoft Software Products. COMPANY may not exercise rights under this Agreement if either (1) COMPANY has a valid OEM License Agreement with Microsoft or a Microsoft affiliate or (2) COMPANY qualifies as an OEM affiliate under an OEM License Agreement. For purposes of this Agreement, “qualifies as an OEM affiliate” means that COMPANY is controlled by, or is under common control with, an entity that has a valid OEM License, where control means direct or indirect majority ownership. COMPANY also agrees that it will not exercise rights as an end user under the Microsoft Software License Terms for the units of Microsoft Software Products leased or rented under this Agreement (“License Terms”).

1. Lease rights and obligations

1.1. License grant, limitations, and obligations

Notwithstanding anything to the contrary in the applicable License Terms for each Microsoft Software Product, Microsoft hereby grants to COMPANY the right to lease Microsoft Software Products on Leased PCs to its customers, each under a Lease (each as defined below). This grant is subject to COMPANY’s continuing compliance with the terms of this Agreement and all applicable license terms.

COMPANY must fully own the leased PCs (“Leased PCs”) and also must enter into a lease agreement (“Lease”) with each of its customers (“Lessees”). The Leased PCs must have Microsoft Software Products preinstalled and each Leased PC can be leased only to a single Lessee. Each Lease must (i) prohibit subleasing or sublicensing of the Leased PCs, (ii) have a term of at least three years, and (iii) automatically terminate upon transfer of ownership of the Leased PC to the Lessee.

Use of each Microsoft Software Product by the Lessee shall be governed by the applicable License Terms for that Microsoft Software Product. COMPANY shall instruct each Lessee to use each Microsoft Software Product in accordance with the applicable License Terms.

This Section 1 does not grant any right to COMPANY to (1) lease Microsoft Software Products on a stand-alone basis; (2) lease or otherwise provide shared access to software products that are accessed from a host device that provides resources, services, and/or information to multiple client computers/workstations; or (3) lease Microsoft Software Products other than under a Lease, except as allowed in Section 2 below.

1.2. Distribution of the Microsoft Software Products

COMPANY shall market and distribute Microsoft Software Products to Lessees only as installed on the Leased PCs as outlined in this Agreement and **not** as “standalone” products. If COMPANY acquires Leased PCs that include a copy of Microsoft Software Products on

separate OEM branded media (for example, CD-ROM) for recovery purposes, such recovery media may be provided to Lessee with the Leased PCs.

1.3. Obligations upon expiration or termination of Leases

When a Lease ends, COMPANY shall keep records of whether ownership of the Leased PCs is transferred to Lessee or to a Microsoft Authorized Refurbisher, or whether the Leased PCs with all Microsoft Software Products and related materials are destroyed. COMPANY does not have the right to transfer the Leased PCs to a different party or to re-lease the Microsoft Software Products under this Agreement. Any further use or transfer is limited to the Lessee of the Microsoft Software Products and is governed solely by the applicable License Terms. COMPANY may re-lease Leased PCs at the end of a Lease provided COMPANY first properly acquires the right to do so.

2. Rental Rights

For each desktop or other personal computer on which COMPANY is licensed to run one of the qualifying applications identified in section 2.1 below (each, a “Qualifying Device”), Microsoft grants COMPANY the limited rental rights in this section 2.

2.1. Qualifying applications for Rental Rights – Office and Windows

Qualifying applications are limited to certain applications acquired through specific Microsoft Programs. The qualifying applications (each, a “Qualifying Application”) by program type are:

Office products

License Agreement that applies to COMPANY's license:					
Qualifying versions of Office for Rental Rights	OEM	PIPC (Japan only)	Microsoft Products and Services Agreement ¹	Open License ¹	Select or Select Plus Agreement ¹
Office Standard 2019			X	X	X
Office Standard 2016			X	X	X
Office Standard 2013			X	X	X
Office Standard 2010			X	X	X
Office Professional Plus 2019			X	X	X
Office Professional Plus 2016			X	X	X
Office Professional Plus 2013			X	X	X
Office Professional Plus 2010			X	X	X
Office Personal 2019	X				
Office Personal 2016	X				
Office Personal 2013	X				
Office Home & Business 2019	X				
Office Home & Business 2016	X				
Office Home & Business 2013	X				
Office Professional 2019	X				
Office Professional 2016	X				
Office Professional 2013	X				
Office Mobile (Licensed for personal, noncommercial use, unless the end user has commercial use rights under a separate agreement)	X				

Windows products

License Agreement that applies to COMPANY's license:				
Qualifying versions of Windows for Rental Rights	OEM	Microsoft Products and Services Agreement ¹	Open License ¹	Select or Select Plus Agreement ¹

Windows 10 Pro (N, KN) (32-bit or 64-bit)	X	X	X	X
Windows 10 IoT Enterprise, Pro for Workstations	X			
Windows 8 and Windows 8.1 (32-bit or 64-bit) – Pro (K, KN)	X	X	X	X
Windows 7 (32-bit or 64-bit) – Professional (K, KN)	X		X	X
Windows Mobile	X			

¹ For Microsoft Software Products purchased under this type of agreement, the “License Terms” are the Volume Licensing Product Terms and the associated terms under which COMPANY licensed the Microsoft Software Products. Effective July 1, 2016, in markets where the Microsoft Products and Services Agreement (MPSA) is available, Microsoft will stop accepting new orders and Software Assurance renewals through existing commercial Select Plus agreements at your next agreement anniversary date. This retirement does not apply to government and academic Select Plus agreements. More information is at www.microsoft.com/en-us/licensing/licensing-programs/select.aspx.

2.2. License grant for Rental Rights – Office and Windows

Notwithstanding anything to the contrary in the applicable License Terms for each Microsoft Software Product (Qualifying Application) identified in section 2.1, Microsoft hereby grants to COMPANY the right to exercise the rental rights allowed in Section 2.3 below. This grant is subject to COMPANY’s continuing compliance with the terms of this Agreement and all applicable license terms.

2.3. Rental Rights

For each Qualifying Device, Microsoft waives the prohibition in the License Terms against renting or leasing the Qualifying Application(s) for Leases and rentals that comply with the terms of this Agreement.

Use of each Qualifying Application by each user will be governed by the License Terms for that Qualifying Application. COMPANY must (1) require each user to accept the License Terms for each Qualifying Application in writing or electronically and (2) notify each user that Microsoft offers no warranty for the Qualifying Application and that Microsoft will not defend the user against any third-party claims or be liable for any damages arising from use of the software.

2.4. Additional requirements for rentals

The Qualifying Application may not be used in a virtual environment.

The Qualifying Application may not be accessed remotely, or in any other manner that enables a user to use the software on a device other than the device for which it is licensed, except as required for technical support purposes using Remote Assistance or similar technologies.

Commercial use: The rights in this section 2 may be exercised for commercial use only.

COMPANY agrees to indemnify, defend, and hold Microsoft harmless, including attorneys’ fees, for claims related to any use of a Qualifying Application under the rental rights granted in this section 2.

3. Additional obligations of COMPANY

3.1. Acquisition of Microsoft Software Products

All Microsoft Software Products, including those on Leased PCs must be genuine Microsoft Software Products, properly acquired and, if an OEM version of a product, preinstalled by an OEM.

3.2. Compliance with license requirements

COMPANY agrees to inform its employees and other individuals who have access to the Microsoft Software Products that the Microsoft Software Products: (i) are licensed by Microsoft and the OEMs, (ii) may be used only subject to the terms and conditions contained in this Agreement (including the applicable License Terms), and (iii) may not be copied, transferred, or otherwise used in violation of such terms and conditions. COMPANY agrees to use all commercially reasonable efforts to prevent any unauthorized distribution, use, duplication, or pirating of the Microsoft Software Products.

3.3. Term and termination of Agreement

This Agreement shall take effect on the date on which COMPANY enters into its first Lease or first exercises the rental rights in section 2 (if earlier) and will remain in effect until terminated by Microsoft. If Microsoft provides notice of termination, then COMPANY's rights under this Agreement will terminate 90 days following the date of the notice; provided, however, that the rights granted by this Agreement with regard to Leases in effect at the time of termination shall survive for the entire length of those Leases. Microsoft also may terminate this Agreement immediately, upon notice, if COMPANY breaches this Agreement. If this Agreement is terminated, COMPANY and its affiliates may not enter into another version of this Agreement without Microsoft's prior written consent.

4. Limitation of liability

There may be situations in which COMPANY has the right to claim damages from Microsoft or its affiliates. Whatever the basis for COMPANY's claim (such as breach of contract or tort), liability of Microsoft and its affiliates will be limited to direct damages up to US\$50.00. This monetary limitation will not apply to (i) liability for damages caused by Microsoft's or its affiliates', or their employees' or agents', recklessness or willful misconduct and awarded by a court of final adjudication or (ii) liability for personal injury or death caused by Microsoft's or its affiliates', or their employees' or agents', negligence or for fraudulent misrepresentation.

Neither Microsoft, its affiliates, nor anyone else who has been involved in the creation, production, or delivery of the Microsoft Software Products, shall be liable for any indirect, consequential, or incidental damages (including damages for loss of business profits, business interruption, loss of business information, and the like) arising out of the use or inability to use the Microsoft Software Products even if Microsoft has been advised of the possibility of such damages.

COMPANY, its affiliates, and its franchisees must not make to any Lessee, or any user of rental rights, any representation with respect to the Microsoft Software Products or the use thereof, except as is explicitly set forth in the License Terms. COMPANY agrees to defend, indemnify, and hold harmless Microsoft and its affiliates from and against any and all claims arising from or relating to COMPANY's breach of this Agreement or any negligent act or omission related to COMPANY's activities under this Agreement.

5. Verifying compliance

5.1. Right to verify compliance

COMPANY must keep records relating to the Leased PCs, its Leases, exercise of rental rights, and implementation of COMPANY's obligations under this Agreement. Microsoft has the right to verify compliance with the Agreement, at Microsoft's expense, during the term of the Agreement, and for a period of one year thereafter.

5.2 Verification process and limitations

To verify compliance, Microsoft will engage an independent accountant from an internationally-recognized public accounting firm, which will be subject to a confidentiality obligation. Verification will take place upon not fewer than 30-days' notice, during normal business hours and in a manner that does not interfere unreasonably with COMPANY's operations. COMPANY must promptly provide the accountant with any information the accountant reasonably requests in furtherance of the verification. As an alternative, Microsoft can require COMPANY to complete Microsoft's self-audit

questionnaire relating to the Leased PCs COMPANY leased, and rental rights COMPANY exercised, under this Agreement, but Microsoft reserves the right to use a verification process as set out above.

If Microsoft undertakes verification and does not find material unauthorized leasing, rental, or failure to keep records required under this Agreement (unauthorized leasing or rental, or records deficiency of 5 percent or more), Microsoft will not undertake another verification of the same entity for at least one year. Microsoft and Microsoft's auditors will use the information obtained in compliance verification only to enforce Microsoft's rights and to determine whether COMPANY is in compliance with the terms of this Agreement. By exercising its rights under this section 5.2, Microsoft does not waive its rights to enforce this Agreement or to protect its intellectual property by any other means permitted by law.

5.3 Remedies for noncompliance

If verification or self-audit reveals any unauthorized leasing or recording deficiencies, COMPANY must promptly acquire the necessary rights to reflect its leasing and rental activities. If material unauthorized leasing or failure to keep required records by COMPANY is found, COMPANY must reimburse Microsoft for the costs Microsoft has incurred in verification within 30 days of the finding.

6. General

This Agreement shall be binding upon and inure to the benefit of the parties hereto and their respective successors and assigns, provided that COMPANY may not assign its rights or obligations under this Agreement in any way without the prior written consent of Microsoft.

If COMPANY is located in Europe, the Middle East, or Africa, this Agreement shall be construed under, and controlled by, the laws of Ireland, and COMPANY consents to jurisdiction and venue in the courts sitting in Ireland. Otherwise, this Agreement shall be construed under, and controlled by, the laws of the State of Washington, United States, exclusive of its choice of law rules, and COMPANY consents to jurisdiction and venue in the courts sitting in King County, State of Washington, United States. Process may be served on either party in the manner as is authorized by applicable law or court rule. Sections 1.3, 3.3, 4, 5, 6, and 7 of this Agreement, as well as the prohibition on exercising rights as an end user under the License Terms for the units of Microsoft Software Products leased under this Agreement, will survive termination or expiration of this Agreement. If any provision of this Agreement is held by a court of competent jurisdiction to be illegal, invalid, or unenforceable, the remaining provisions shall remain in full force and effect.

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11. Product Terms Windows 10 IoT CLA

ADDITIONAL TERMS FOR WINDOWS 10 IoT ENTERPRISE AND WINDOWS 10 IoT CORE DEVICE LICENSES

Additional Terms contained in this document are only applicable to CLA 6.0. For successor versions of the CLA please see the applicable Product Terms documents available on the Licensing and Programs Resource Center of the Partner Portal.

Product Name and Version	Applicable Additional Terms	Product End of License
Windows® 10 IoT Enterprise 2019 LTSC High End (Virtualization Only for Qualified Operating System) (ESD)	(1), (2), (4), (5), (7), (10), (11), (12), (13), (14), (15), (16), (17), (18), (27), (28), (29), (30), (31), (35), (36), (37), (39), (40), (41), (42), (43), (44), (45), (49)	Nov 30, 2028
Windows® 10 IoT Enterprise 2019 LTSC High End (Virtualization Only for Non-Qualified Operating System) (ESD)	(1), (2), (4), (5), (7), (10), (11), (12), (13), (14), (15), (16), (17), (18), (27), (28), (29), (30), (31), (35), (36), (37), (39), (40), (41), (42), (43), (44), (45), (49)	Nov 30, 2028
Windows® 10 IoT Enterprise 2019 LTSC High End (ESD)	(1), (2), (4), (5), (6), (7), (9), (10), (11), (12), (13), (14), (15), (17), (18), (20), (28), (29), (30), (31), (35), (36), (37), (39), (40), (41), (42), (43), (44), (45), (49)	Nov 30, 2028
Windows® 10 IoT Enterprise 2019 LTSC Value (ESD)	(1), (2), (4), (5), (6), (7), (9), (10), (11), (12), (13), (14), (15), (17), (18), (20), (28), (29), (30), (31), (34), (36), (37), (39), (40), (41), (42), (43), (44), (45), (49)	Nov 30, 2028
Windows® 10 IoT Enterprise 2019 LTSC Entry (ESD)	(1), (2), (4), (5), (6), (7), (9), (10), (11), (12), (13), (14), (15), (17), (18), (20), (28), (29), (30), (31), (33), (36), (37), (39), (40), (41), (42), (43), (44), (45), (49)	Nov 30, 2028
Windows® 10 IoT Enterprise 2019 LTSC Upgrade High End (ESD)	(1), (2), (4), (5), (6), (7), (9), (10), (11), (12), (13), (14), (15), (17), (18), (23), (28), (29), (30), (31), (35), (36), (37), (39), (40), (41), (42), (43), (44), (45), (49)	Nov 30, 2028
Windows® 10 IoT Enterprise 2019 LTSC Upgrade Value (ESD)	(1), (2), (4), (5), (6), (7), (9), (10), (11), (12), (13), (14), (15), (17), (18), (23), (28), (29), (30), (31), (34), (36), (37), (39), (40), (41), (42), (43), (44), (45), (49)	Nov 30, 2028
Windows® 10 IoT Enterprise 2019 LTSC Upgrade Entry (ESD)	(1), (2), (4), (5), (6), (7), (9), (10), (11), (12), (13), (14), (15), (17), (18), (23), (28), (29), (30), (31), (33), (36), (37), (39), (40), (41), (42), (43), (44), (45), (49)	Nov 30, 2028
Windows® 10 IoT Enterprise 2016 LTSB High End (Virtualization Only for Qualified Operating System) (ESD)	(1), (2), (4), (5), (7), (10), (11), (12), (13), (14), (15), (16), (17), (18), (27), (28), (29), (30), (31), (35), (36), (37), (39), (40), (41), (42), (43), (44), (49)	July 31, 2026
Windows® 10 IoT Enterprise 2016 LTSB High End (Virtualization Only for Non-Qualified Operating System) (ESD)	(1), (2), (4), (5), (7), (10), (11), (12), (13), (14), (15), (16), (17), (18), (27), (28), (29), (30), (31), (35), (36), (37), (39), (40), (41), (42), (43), (44), (49)	July 31, 2026

Windows® 10 IoT Enterprise 2016 LTSB High End (ESD)	(1), (2), (4), (5), (6), (7), (9), (10), (11), (12), (13), (14), (15), (17), (18), (20), (28), (29), (30), (31), (35), (36), (37), (39), (40), (41), (42), (43), (44), (49)	July 31, 2026
Windows® 10 IoT Enterprise 2016 LTSB Value (ESD)	(1), (2), (4), (5), (6), (7), (9), (10), (11), (12), (13), (14), (15), (17), (18), (20), (28), (29), (30), (31), (34), (36), (37), (39), (40), (41), (42), (43), (44), (49)	July 31, 2026
Windows® 10 IoT Enterprise 2016 LTSB Entry (ESD)	(1), (2), (4), (5), (6), (7), (9), (10), (11), (12), (13), (14), (15), (17), (18), (20), (28), (29), (30), (31), (33), (36), (37), (39), (40), (41), (42), (43), (44), (49)	July 31, 2026
Windows® 10 IoT Enterprise 2016 LTSB Upgrade High End (from 2015 LTSB only) (ESD)	(1), (2), (4), (5), (6), (7), (9), (10), (11), (12), (13), (14), (15), (17), (18), (23), (28), (29), (30), (31), (35), (36), (37), (39), (40), (41), (42), (43), (44), (49)	July 31, 2026
Windows® 10 IoT Enterprise 2016 LTSB Upgrade Value (from 2015 LTSB only) (ESD)	(1), (2), (4), (5), (6), (7), (9), (10), (11), (12), (13), (14), (15), (17), (18), (23), (28), (29), (30), (31), (34), (36), (37), (39), (40), (41), (42), (43), (44), (49)	July 31, 2026
Windows® 10 IoT Enterprise 2016 LTSB Upgrade Entry (from 2015 LTSB only) (ESD)	(1), (2), (4), (5), (6), (7), (9), (10), (11), (12), (13), (14), (15), (17), (18), (23), (28), (29), (30), (31), (33), (36), (37), (39), (40), (41), (42), (43), (44), (49)	July 31, 2026
Windows® 10 IoT Enterprise 2016 LTSB Upgrade High End (ESD)	(1), (2), (4), (5), (6), (7), (9), (10), (11), (12), (13), (14), (15), (17), (18), (23), (28), (29), (30), (31), (35), (36), (37), (39), (40), (41), (42), (43), (44), (49)	July 31, 2026
Windows® 10 IoT Enterprise 2016 LTSB Upgrade Value (ESD)	(1), (2), (4), (5), (6), (7), (9), (10), (11), (12), (13), (14), (15), (17), (18), (23), (28), (29), (30), (31), (34), (36), (37), (39), (40), (41), (42), (43), (44), (49)	July 31, 2026
Windows® 10 IoT Enterprise 2016 LTSB Upgrade Entry (ESD)	(1), (2), (4), (5), (6), (7), (9), (10), (11), (12), (13), (14), (15), (17), (18), (23), (28), (29), (30), (31), (33), (36), (37), (39), (40), (41), (42), (43), (44), (49)	July 31, 2026
Windows® 10 IoT Enterprise SAC High End (Virtualization Only for Qualified Operating System) (ESD)	(1), (2), (4), (5), (7), (10), (11), (12), (13), (14), (15), (16), (17), (18), (27), (28), (29), (30), (31), (35), (36), (37), (38), (39), (40), (41), (42), (43), (44), (45), (49)	N/A
Windows® 10 IoT Enterprise SAC High End (Virtualization Only for Non-Qualified Operating System) (ESD)	(1), (2), (4), (5), (7), (10), (11), (12), (13), (14), (15), (16), (17), (18), (27), (28), (29), (30), (31), (35), (36), (37), (38), (39), (40), (41), (42), (43), (44), (45), (49)	N/A
Windows® 10 IoT Enterprise SAC High End (ESD)	(1), (2), (4), (5), (6), (7), (9), (10), (11), (12), (13), (14), (15), (17), (18), (20), (28), (29), (30), (31), (35), (36), (37), (38), (39), (40), (41), (42), (43), (44), (45), (49)	N/A
Windows® 10 IoT Enterprise SAC Value (ESD)	(1), (2), (4), (5), (6), (7), (9), (10), (11), (12), (13), (14), (15), (17), (18), (20), (28), (29), (30), (31), (34), (36), (37), (38), (39), (40), (41), (42), (43), (44), (45), (49)	N/A
Windows® 10 IoT Enterprise SAC Entry (ESD)	(1), (2), (4), (5), (6), (7), (9), (10), (11), (12), (13), (14), (15), (17), (18), (20), (28), (29), (30), (31), (33), (36), (37), (38), (39), (40), (41), (42), (43), (44), (45), (49)	N/A

Windows® 10 IoT Enterprise SAC Upgrade High End (from 2015 LTSB only) (ESD)	(1), (2), (4), (5), (6), (7), (9), (10), (11), (12), (13), (14), (15), (17), (18), (23), (28), (29), (30), (31), (35), (36), (37), (38), (39), (40), (41), (42), (43), (44), (45), (49)	July 31, 2025
Windows® 10 IoT Enterprise SAC Upgrade Value (from 2015 LTSB only) (ESD)	(1), (2), (4), (5), (6), (7), (9), (10), (11), (12), (13), (14), (15), (17), (18), (23), (28), (29), (30), (31), (34), (36), (37), (38), (39), (40), (41), (42), (43), (44), (45), (49)	July 31, 2025
Windows® 10 IoT Enterprise SAC Upgrade Entry (from 2015 LTSB only) (ESD)	(1), (2), (4), (5), (6), (7), (9), (10), (11), (12), (13), (14), (15), (17), (18), (23), (28), (29), (30), (31), (33), (36), (37), (38), (39), (40), (41), (42), (43), (44), (45), (49)	July 31, 2025
Windows® 10 IoT Enterprise SAC Upgrade High End (ESD)	(1), (2), (4), (5), (6), (7), (9), (10), (11), (12), (13), (14), (15), (17), (18), (23), (28), (29), (30), (31), (35), (36), (37), (38), (39), (40), (41), (42), (43), (44), (45), (49)	N/A
Windows® 10 IoT Enterprise SAC Upgrade Value (ESD)	(1), (2), (4), (5), (6), (7), (9), (10), (11), (12), (13), (14), (15), (17), (18), (23), (28), (29), (30), (31), (34), (36), (37), (38), (39), (40), (41), (42), (43), (44), (45), (49)	N/A
Windows® 10 IoT Enterprise SAC Upgrade Entry (ESD)	(1), (2), (4), (5), (6), (7), (9), (10), (11), (12), (13), (14), (15), (17), (18), (23), (28), (29), (30), (31), (33), (36), (37), (38), (39), (40), (41), (42), (43), (44), (45), (49)	N/A
Windows® 10 IoT Enterprise 2015 LTSB High End (ESD)	(1), (2), (4), (5), (6), (7), (9), (10), (11), (12), (13), (14), (15), (17), (18), (20), (28), (29), (30), (31), (35), (36), (37), (39), (40), (41), (42), (43), (44), (49)	July 31, 2025
Windows® 10 IoT Enterprise 2015 LTSB Value (ESD)	(1), (2), (4), (5), (6), (7), (9), (10), (11), (12), (13), (14), (15), (17), (18), (20), (28), (29), (30), (31), (34), (36), (37), (39), (40), (41), (42), (43), (44), (49)	July 31, 2025
Windows® 10 IoT Enterprise 2015 LTSB Entry (ESD)	(1), (2), (4), (5), (6), (7), (9), (10), (11), (12), (13), (14), (15), (17), (18), (20), (28), (29), (30), (31), (33), (36), (37), (39), (40), (41), (42), (43), (44), (49)	July 31, 2025
Windows® 10 IoT Enterprise 2015 LTSB Upgrade High End (ESD)	(1), (2), (4), (5), (6), (7), (9), (10), (11), (12), (13), (14), (15), (17), (18), (23), (28), (29), (30), (31), (35), (36), (37), (39), (40), (41), (42), (43), (44), (49)	July 31, 2025
Windows® 10 IoT Enterprise 2015 LTSB Upgrade Value (ESD)	(1), (2), (4), (5), (6), (7), (9), (10), (11), (12), (13), (14), (15), (17), (18), (23), (28), (29), (30), (31), (34), (36), (37), (39), (40), (41), (42), (43), (44), (49)	July 31, 2025
Windows® 10 IoT Enterprise 2015 LTSB Upgrade Entry (ESD)	(1), (2), (4), (5), (6), (7), (9), (10), (11), (12), (13), (14), (15), (17), (18), (23), (28), (29), (30), (31), (33), (36), (37), (39), (40), (41), (42), (43), (44), (49)	July 31, 2025
Windows® 10 IoT Enterprise 2015 LTSB High End (Virtualization Only for Qualified Operating System) (ESD)	(1), (2), (3), (4), (5), (7), (10), (11), (12), (13), (14), (15), (16), (17), (18), (19), (28), (27), (29), (30), (31), (37), (39), (40), (41), (42), (43), (44), (49)	July 31, 2025
Windows® 10 IoT Enterprise 2015 LTSB High End (Virtualization Only for Non-Qualified Operating System) (ESD)	(1), (2), (3), (4), (5), (7), (10), (11), (12), (13), (14), (15), (16), (17), (18), (19), (27), (28), (29), (30), (31), (37), (39), (40), (41), (42), (43), (44), (49)	July 31, 2025

Windows® 10 IoT Core (ESD)	(1), (2), (5), (13), (15), (18), (29), (30), (37), (40), (45), (46), (47), (49)	N/A
Windows® 10 IoT Core Services (ESD)	(1), (2), (5), (13), (15), (18), (20), (29), (30), (37), (40), (45), (46), (48), (49)	N/A

The following Additional Terms (“AT”) apply to the Products as indicated above and are in addition to terms of Company’s Microsoft OEM Customer License Agreement for Embedded Systems (“Agreement”). Capitalized terms used below and not otherwise defined have the meaning set in the Agreement. These ATs supersede any inconsistent terms in the Agreement.

1. General Terms

(a) Valid Agreement

In order to obtain Runtime License Envelopes, Company must have a valid, current Agreement.

(b) License Terms

- (1) Company shall sublicense rights to use the Product to each End User by means of License Terms. MS License Terms for each Product are posted on the Partner Portal. For purposes of this subsection, “MS License Terms” means the Product License Terms available on the Partner Portal. Company may use different terms or additional terms, as long as they are no less protective of MS than the MS License Terms.
- (2) If Company elects to use the MS License Terms, Company should substitute its name for “[OEM]” in the MS License Terms. Company may also substitute the term “[Company]’s software suppliers” for the term “MS” in the MS License Terms.
- (3) Company must notify each End User before or at the time of purchase that the
 - (i) Embedded System contains software that is subject to the License Terms; and
 - (ii) End User must agree to the License Terms before using the Embedded System.
- (4) Company must distribute License Terms in a manner that forms a contract binding the End User under applicable law.
- (5) From time to time, MS may update the MS License Terms for a Product. Any such updates will be posted on the Partner Portal. For each Product, Company may use any version of the applicable MS License Terms that has been posted on the Partner Portal during the term of this Agreement. Certain updates to the MS License Terms may be required as provided in Section 2 (License Grant Limitations) of the Agreement.

(c) Windows Preinstallation Environment

- (1) Company may include Microsoft® Windows® Preinstallation Environment, Version 3.0 or any successor version (“WinPE 3.0”) in the recovery solution for the Product..
- (2) No royalty is owed for WinPE 3.0 included in recovery solutions pursuant to this Section 1(d).
- (3) WinPE 3.0 may not function properly with the Product. If Company includes WinPE 3.0 in a recovery solution, then the following terms apply:
 - (i) Despite any other terms in the Agreement, MS and its Suppliers provide WinPE 3.0 “AS IS” and with all faults. MS and its Suppliers make no warranties, conditions or guarantees with respect to these products and disclaim all warranties and conditions, whether express, implied or statutory, including but not limited to any warranties or conditions of or related to merchantability and fitness for a particular purpose, the entire risk arising out of use or performance of these products and any support services remains with Company and the End User. The foregoing limitations, exclusions and disclaimers will apply to the maximum extent permitted by applicable law; and 5 10/1/18
 - (ii) Company must provide prominent notice to End Users indicating that the recovery solution may not function properly.

(d) Language Versions

Language versions other than English are licensed on an “if and as available” basis.

(e) Definitions

“Partner Portal” means the website designated by Microsoft through which Microsoft may provide access to tools, documents and communications to Company, as updated by Microsoft from time to time.
“Processor” means a central processing unit, including dual core and multi-core processors.
“Processor Requirements” means the document posted at <https://go.microsoft.com/fwlink/?linkid=847781> (or updated URL).

2. Permitted Use of Deliverables

Company may only use the Deliverables to:

- (a) perform internal testing of Embedded Systems, and

- (b) install the MS Binaries on Embedded Systems. Company shall preinstall the MS Binaries in accordance with the instructions in the Deliverables. Company shall not change or delete any part of the Product unless expressly allowed by such instructions.

Such testing and installation shall be conducted only on Company premises by Company employees or Contractors. Company shall make no changes or deletions to the Product except as expressly permitted in the Agreement or in the Deliverables.

3. Terminal Services Protocols

Company may use terminal services protocols to enable an Embedded System to connect to and access applications running on a server. These include Remote Desktop Protocol, Remote Assistance and Independent Computer Architecture. If Company uses these protocols on an Embedded System, then Company shall not allow any Desktop Functions to run locally on that system, except for network/Internet browsing functions. Company shall advise its End Users of this requirement.

4. Product Keys

Company may install and use the Product to develop and test prototype Embedded Systems. Company may use the test Product Key included in the Deliverables to install the test Images. Any Images installed using the test Product Key will not function more than 30 days after Company first boots an Image on a prototype system. Company must use Embedded Product Key Entry Activation ("EPKEA") or Product Key Entry Activation ("PKEA") with Images that will be distributed.

5. Product End of License. Company's license for the Product ends on the earlier of the date included in the Product Table, or end of the Agreement.

6. Virtualization

Company may only preinstall this Product configured to run directly on a physical hardware system. Company must not install this Product within any virtual (or otherwise emulated) hardware system.

7. Use of USB Drive for Embedded Systems

Company may incorporate up to two internal USB Drives into the design of its Embedded Systems under the following terms:

- (a) The USB Drives must be mounted inside the Embedded System.
(b) If Company includes two USB Drives, one of them may be used for recovery purposes only (see Section (e) below). 6 10/1/18
(c) Each internal USB Drive must work only on Company's applicable Embedded System and must use commercially reasonable authentication of each USB Drive to ensure the foregoing.
(d) Each Embedded System must bear a COA that meets the requirements of the Agreement.
(e) **Recovery Image Rights.** Company's rights regarding Recovery Images are included in Section 2(f) of the Agreement. Company may distribute Recovery Images on an internal Recovery Image USB Drive. The Recovery Image USB Drive must include only the Recovery Image and the Recovery Image USB Drive must not be rewriteable. (In other words, the internal USB Drive must be "write once, read many".) All other requirements for Recovery Images remain unchanged.

(f) **Replacement USB Drives**

- (1) **Replacement.** If Company removes or replaces an internal USB Drive, then Company:

- (i) must destroy the replaced internal USB Drive or refurbish it as provided in Section (f)(3) below.
- (ii) may distribute replacement USB Drives separate from an Embedded System only directly to an Enterprise Customer (cannot be distributed through Company's Channel partners) for replacement of existing internal USB Drive. OEM must require an Enterprise Customer to internally mount the replacement USB Drive in the Embedded System and prohibit any use of the replacement USB Drive externally. Company must instruct Enterprise Customers to destroy each replaced internal USB Drive or return it to Company.
- (iii) must distribute replacement internal USB Drives directly to Enterprise Customers at no charge, except for the reasonable costs Company incur for materials, shipping, and handling.

- (2) **Royalty.** No additional royalty shall accrue to MS for replacement internal USB Drives, provided that:

- (i) Company complies with Section (f)(1) above, and
- (ii) the replaced units are returned or destroyed (as specified under Section (f)).

- (3) **Refurbishment.** Company may repair or refurbish internal USB Drives replaced by Company or an Enterprise Customer. Company may redistribute those repaired or refurbished internal USB Drives as allowed in this Section (f). Company must destroy any replaced internal USB Drives that are not repaired or refurbished.

8. [Intentionally left blank]

9. Connection Limit

Company may permit up to 20 computers or other devices to connect via Server Message Block (“SMB”) to the Embedded System to use one or more of the following services of the Product:

- (a) File services,
- (b) Print services,

This 20-connection limit applies to computers and devices that access the software indirectly through “multiplexing” or other software or hardware that pools connections. The 20-connection limit does not apply to other uses of the Product. Unlimited inbound connections are allowed via TCP/IP (Transmission Control Protocol (“TCP”) and the Internet Protocol (“IP”)).

10. No Retail Channel Distribution. Embedded Systems containing this Product shall:

- (a) be marketed solely to business (including Enterprise Customer) and government entities;
- (b) be sold directly by Company or via the Channel to business (including Enterprise Customer) and government entities;
- (c) not be distributed individually to consumer end users; and
- (d) not be kept in stock at consumer retailers. 7 10/1/18

11. End User Interface and Embedded Applications

- (a) Company may use the shell included in the Deliverables as the End User interface to support Windows 10 compatible Embedded Applications.
- (b) Company must comply with the ‘Guidelines for Designing Embedded Systems with Windows 10 IoT Enterprise’ white paper posted on the Partner Portal which may be updated from time to time.
- (c) To take advantage of the Windows 10 shell or user interface, Company may add one or more Embedded Applications that End Users can access and execute via the user interface.

12. Embedded Product Key Entry Activation (“EPKEA”)

- (a) Company may implement EPKEA to pre-activate the MS Binaries during the Embedded System manufacturing process.
- (b) Company must comply with the following requirements:
 - (1) Company must comply with all EPKEA requirements contained in the Embedded Activation application and process documentation located on the Partner Portal.
 - (2) The Recovery Image for this Product must include EPKEA.
 - (3) Company shall pay MS, as the Default Charge, an amount equal to 130% of the royalty for this Product for each Embedded System activated with an EPKEA key lost by Company. MS also reserves the right to terminate Company’s right to implement and distribute EPKEA or immediately terminate this Agreement. In addition, MS may require Company to re-create Images with a new EPKEA key.

13. Processors

No Embedded System shall be designed to support this Product with more than two Processors. Company shall not distribute this Product on any Embedded System that supports more than two Processors.

14. 32-Bit and 64-Bit Installations

- (a) **32 Bit and 64 Bit.** The OPK for this Product includes 32- and 64-bit versions.
 - (1) If the Embedded System uses a compatible 32-bit processor, Company may only install the 32-bit version.
 - (2) If the Embedded System uses a compatible 64-bit processor, Company may install either the 64- or the 32-bit version, or both.
- (b) **Documentation.** For Embedded Systems pre-installed with Product, Company may document the fact Embedded Systems contain both the 64-bit and 32-bit versions of the Products with the right for End Users to switch between the 64-bit and 32-bit versions. Any documentation must clearly indicate that the End User may only use one of these versions at a time and that switching between these versions requires uninstalling the other version. If End Users chooses to switch between the 64-bit and 32-bit versions, End User must comply with the License Terms of the Product.
- (c) **Selection Utility.** If Company includes both the 32-bit and 64-bit versions in an Embedded System, Company must include a utility for End Users to select one of these versions. After selection, the utility must delete the other version.
- (d) **Recovery.** An End User may use Company’s Recovery Image to switch between 32-bit and 64-bit versions. If an End User of an Embedded System with a compatible 64-bit Processor requests Recovery Image media with the 32-bit or 64-bit version, Company may provide the media even if that version was not preinstalled on that Embedded System. Company’s Recovery Image and media must be in a format that deletes the other

version of the Product, excluding data folders with End User's settings and configurations. Company must notify the End User to back-up data and applications prior to installing the other version. This notice may be inside the Embedded System package or with the media. For Embedded Systems preinstalled with Windows Embedded 8 or successor versions, Company must: 8 10/1/18

- (1) Provide the following notice in a clear and conspicuous manner to each End User with the recovery media, and on Company's support webpage:

"Installing the 32-bit version of <Product> on this system requires a change to the BIOS settings to legacy BIOS mode. Switching back to the 64-bit version of <Product> from the 32-bit version of <Product> will require you to revert back to the original BIOS settings. If you do not revert back to these BIOS settings the following Windows 8 functionalities will not work as they rely on a native UEFI mode boot:

- (i) Secure Boot
- (ii) Seamless Boot experience
- (iii) Network unlock for Bitlocker for systems with a Trusted Platform Module ("TPM")
- (iv) eDrive support

Reverting back to UEFI mode will require a hard drive reformat. All data and personal settings will be lost. It is highly recommended that you back up your data before you revert back to UEFI mode."

(2) Provide clear instructions to each End User in the Embedded System packaging, with Recovery Images and on Company's support website detailing how to switch from Unified Extensible Firmware Interface ("UEFI") + Compatibility Support Module ("CSM") or legacy BIOS mode to native UEFI with Secure Boot enabled. The CSM can be used in two ways: (1) it can be used by firmware in the boot path to boot into a compatible BIOS mode or (2) it can be loaded during UEFI boot to provide support for legacy services. When Secure Boot is enabled Windows CSM should not be installed for any other purpose.

(3) Company's Recovery Image for each Embedded System may include each LP and LIP available for the preinstalled Product.

15. Assessment and Deployment Kit

For clarity, the Windows 10 Product Assessment and Deployment Kit ("ADK") is considered part of the Product such that references to the OPK are applicable to the ADK (as appropriate). MS may modify the ADK from time to time. In the event of any conflict between the online ADK license terms and the Agreement, the terms of the Agreement shall control.

16. Processors

Company may install the Product on an Embedded System or Partitioned Embedded System in a virtual Instance configured to support no more than two processors.

17. Adobe® Flash® Player.

- (a) This Product includes Adobe Flash Player technology from Adobe Systems Incorporated. Company shall have the right to distribute the Adobe Flash Player in the Products that include Internet Explorer and/or Microsoft Edge; provided that: (i) Company disables the Adobe Flash Player in compliance with the instructions in the 'Guidelines for Designing Embedded Systems with Windows Embedded 8' or 'Guidelines for Designing Embedded Systems with Windows 10 IoT Enterprise' white paper (as applicable) posted on the Partner Portal and (ii) does not re-enable or use the Adobe Flash Player without a separate license from Adobe or an authorized Adobe partner.
- (b) Company will indemnify and hold harmless Microsoft Parties for any claim from Adobe resulting from any unauthorized use of Adobe Flash Player in breach of this AT.
- (c) For purposes of this AT, "Thin Client Device" means an Embedded System that depends heavily on some other computer (may be a server) to fulfill its computational roles; and "Desktop Functions" means consumer or general purpose tasks or processes (such as using word processing, spreadsheet, or slide show presentation software) performed exclusively or primarily by a PC device. If this Product is included on Embedded Systems that are designed and marketed as Thin Client Devices, then the below terms apply: 9 10/1/18

This Product includes Adobe Flash Player technology from Adobe Systems Incorporated. Company shall have the right to distribute the Adobe Flash Player in the Products that include Internet Explorer and/or Microsoft Edge on Embedded Systems where Thin Client is the primary functionality; provided that Company must notify each End User before or at the time of purchase that the Embedded System contains Third Party software that is subject to the license terms for Adobe Systems Incorporated/Adobe Systems Software Ireland Limited, which license terms can be found at go.microsoft.com/fwlink/?linkid=248532. Adobe and Flash are either registered trademarks or trademarks of Adobe Systems Incorporated in the United States and/or other countries.

18. Default Settings

In some cases, OEMs may configure default settings on this Product on behalf of the End User, including without limitation turning on by default the Location Services and Input Personalization features as described in <http://go.microsoft.com/fwlink/?LinkId=521839>.

OEMs who turn these features on by default in the images distributed to End Users must:

- Notify End Users that these features have been enabled and provide End Users with links to <http://go.microsoft.com/fwlink/?LinkId=521839> or equivalent instructions on how to disable these features; AND
- Secure consent from the relevant End Users to enable such features by default, if required by and to the extent required by applicable law.

In the event that Company has configured the image or device provided to End Users such that the end user is no longer able to disable Location Services or Input Personalization, these features must be turned off by Company. Nothing in AT (18) is intended to limit Company's obligations to comply with all applicable data protection and privacy laws applying to the Products or their performance under this Agreement.

19. Cloud Computing Devices

Company may allow an Embedded System to use Internet browsing functionality to connect to and access cloud hosted applications (for example, Microsoft Office 365), provided that:

- (a) Company shall not allow any Desktop Functions to run locally on the Embedded System;
- (b) Any files that result from the use of Desktop Functions must not be permanently stored on the Embedded System; and
- (c) Company shall advise End Users of the requirements in (a) and (b) in the License Terms for the Product.

20. Field Upgrade

This Product may not be used in Field Upgrade Images.

21. [Intentionally left blank]

22. [Intentionally left blank]

23. Field Upgrade Existing Image Change

Field Upgrade terms for this Product are edited as follows. Section 1. Additional Definitions "Existing Image" is edited to read:

"Existing Image" means:

- (a) An Image that includes a prior version of the MS Binaries, or
- (b) A software image that includes an operating system different from the Product contained in the Field Upgrade Image; excluding Microsoft Windows products distributed on general purpose personal computing devices. 10 10/1/18

24. [Intentionally left blank]

25. [Intentionally left blank]

26. [Intentionally left blank]

27. Virtualization Rights and Limitations

- (a) For purposes of this AT:

(1) Additional Definitions.

- (i) "Instance" means an instance of software (including Product software) created by executing the software's setup or install procedure or by duplicating an existing Instance. To "run an Instance" means to load an Instance of the software into memory and execute one or more of its instructions. Once running, an "Instance" is considered to be running (whether or not its instructions continue to execute) until it is removed from memory.
- (ii) "Non-Qualified Operating System" or "Non-QOS" means any non-Microsoft operating system, or one of the following previous versions of Microsoft embedded operating system Products, which may be used as an Embedded System Physical OSE under the terms of this AT:
 - Windows® 7 Professional for Embedded Systems;
 - Windows® 7 Ultimate for Embedded Systems;
 - Windows® Embedded 8 Pro; and
 - Windows® Embedded 8.1 Pro.
 - Microsoft® Windows Server® 2008 R2 for Embedded Systems Standard (all versions)
 - Microsoft® Windows Server® 2008 R2 for Embedded Systems Enterprise (all versions)

- Microsoft® Windows Server®Hyper-V
- (iii) “Operating System Environment” or “OSE” means all or part of an operating system Instance, or all or part of a virtual (or otherwise emulated) operating system Instance which enables separate machine identity (primary computer name or similar unique identifier) or separate administrative rights, and instances of applications, if any, configured to run on the operating system Instance or parts identified above. There are two types of OSEs, physical and virtual. A physical hardware system can have one Physical OSE and/or one or more Virtual OSEs.
- (iv) “Physical OSE” means an OSE that is configured to run directly on a physical hardware system. The operating system Instance used to run hardware virtualization software (e.g. Microsoft Hyper-V or similar third-party technologies) or to provide hardware virtualization services (e.g. Microsoft virtualization technology or similar third-party technologies) is considered part of the Physical OSE.
- (v) “Qualified Operating System” or “QOS” means the following latest generation Microsoft embedded operating system Products which may be used as an Embedded System Physical OSE under the terms of this AT:
 - Windows® 10 Enterprise [LTSB, LTSC, or SAC] for IoT High End or successor Product; or
 - Windows Server® 2012 / 2012 R2 for Embedded Systems [Standard or Datacenter] or successor Product.
- (vi) “Virtual OSE” means an OSE that is configured to run on a virtual hardware system. Product to which this AT applies must be deployed as a Virtual OSE.

(2) An embedded system must not be a thin client or mobile device.

- (b) The rights granted in this AT are in addition to the rights granted in the Embedded Agreement. For clarification purposes, Company’s embedded solutions must comply with the definition of Embedded system and all terms and conditions related to Embedded Systems including Section 2 (License Grant and Limitations) of the Embedded Agreement. 11 10/1/18
- (c) For Embedded systems where the Physical OSE is a QOS, Company must use the applicable Products containing ‘Virtualization Only for Qualified Operating System’ as part of the Product Name and pay the corresponding royalty for such Products. Company may only Distribute a QOS as a Physical OS with an Embedded System that meets the Processor Requirements for the QOS.
- (d) For Embedded Systems where the Physical OSE is a Non-QOS, Company must use the applicable Products containing ‘Virtualization Only for Non-Qualified Operating System’ as part of the Product Name and pay the corresponding royalty for such Products. Company may only Distribute a Non-QOS as a Physical OS with an Embedded System that meets the Processor Requirements for Non-QOSes that are previous versions of Microsoft embedded operating system Products.
- (e) Company must not add or remove a Virtual OSE or move a Virtual OSE from the Embedded System to another Embedded System after final configuration and delivery of the Embedded System to an End User. However, an existing Virtual OSE may be replaced with an identical Virtual OSE for recovery purposes.
- (f) Only one user at a time may access the Embedded System.
- (g) With the exception of access for administration and technical support purposes, using the Windows remote assistance feature or similar technology is prohibited. Company does not need a license to access Instances only to administer the Product software.
- (h) An OSE must not contain a non-embedded version of a Microsoft operating system product.
 - (1) For non-OA 3.0 Product, Company must affix a separate COA and pay a separate royalty rate for each Instance of the Product installed (excluding recovery solutions allowed under the Embedded Agreement). For OA 3.0 Product, Company must install only one Instance of the Product utilizing a DPK and affix the appropriate GML. For any additional Instances of the Product, Company must affix a COA, and pay a separate royalty for each Instance (excluding recovery solutions allowed under the Embedded Agreement).
- (j) There is no limit on the number of Virtual OSEs allowed, however Company must comply with the COA/GML and payment requirements in subsection (i) above.
- (k) Migration rights as described in Section 7 of the Licensing Appendix do not apply to Embedded Systems containing one or more Virtual OSEs.
- (l) A Virtual OSE must not be utilized to perform the functions of a thin client device.
- (m) Any Product virtualization rights not explicitly granted in this AT are prohibited including, but not limited to:
 - (1) Application virtualization (i.e., no App-V);
 - (2) Presentation virtualization (i.e., no functioning as a Virtual Desktop Infrastructure server); and
 - (3) Software appliances (i.e., no shipping Virtual OSE without hardware; no hosting Virtual OSE on a server, in a datacenter or in the cloud).
- (n) Company must include the following additional terms in the License Terms distributed with Embedded Systems in compliance with this AT and otherwise comply with the requirements stated in Section 4(c) of the Licensing Appendix.
 - (1) “Instance” means an instance of software created by executing the software’s setup or install procedure or by duplicating an existing Instance. To “run an Instance” means to load an Instance of the software

- into memory and execute one or more of its instructions. Once running, an “Instance” is considered to be running (whether or not its instructions continue to execute) until it is removed from memory.
- (2) “Operating System Environment” or “OSE” means all or part of an operating system Instance, or all or part of a virtual (or otherwise emulated) operating system Instance which enables separate machine identity (primary computer name or similar unique identifier) or separate administrative rights, and 12 10/1/18 instances of applications, if any, configured to run on the operating system Instance or parts identified above. There are two types of OSEs, physical and virtual. A physical hardware system can have one Physical OSE and/or one or more Virtual OSEs.
- (3) “Physical OSE” means an OSE that is configured to run directly on a physical hardware system. The operating system Instance used to run hardware virtualization software (e.g. Microsoft Hyper-V or similar technologies) or to provide hardware virtualization services (e.g. Microsoft virtualization technology or similar technologies) is considered part of the Physical OSE.
- (4) “Virtual OSE” means an OSE that is configured to run on a virtual hardware system.
- (5) This is a single user device. Only one user at a time may access Instance(s) running on the device.
- (6) You must not add or remove a Virtual OSE or move a Virtual OSE from the device to another device or system.
- (7) With the exception of access for administration and technical support purposes, using of Remote Assistance or similar technology is prohibited. You do not need a license to access Instances only to administer the software.
- (8) Your rights to use the software as permitted hereunder expire when the applicable device is retired from service.

28. Language Packs (LPs) and Language Interface Packs (LIPs)

- (a) **Language Packs.** Company must distribute these Products with at least one LP preinstalled. The LP defines the base language of the user interface. Some LPs are not fully localized. Company may install more than one LP for these Products and allow the End User to select the language version. Where more than one base LP is preinstalled, Company may treat any one of the LPs as the base language.
- (b) **LIPs.** Company may distribute one or more LIPs licensed as supplements to these Products. LIPs are not fully localized and must be applied to a base LP. LIPs may not be marketed as full language versions. Refer to MSDN for a complete list of LPs and LIPs available for these Products and the base LP required for each LIP.
- (d) **Recovery.** Company's recovery solution for each Embedded Systems may include each LP and LIP available for the preinstalled Product.
- (e) **Windows Products with Language Switching Rights.**
- (1) Language Selection. Company may give End Users the right to switch between language versions included in the Product by Company. This right must be granted in the License Terms for the Product.
 - (2) Advertising. Company may advertise the ability for End Users to select between more than one LP and to switch between LPs.

29. Windows 10 IoT App Servicing. The Windows 10 IoT App servicing program (“App Servicing Program”) is an optional program for Embedded Systems preinstalled with this Product. The App Servicing Program provides Company the opportunity to obtain certification of Apps, preinstall such Apps on Embedded Systems and service the Apps via the Windows Store. For purposes of this AT:

- (a) “Apps” mean applications that:
- (1) are Embedded Applications, Additional Software or Support Software;
 - (2) have been built using the APIs at the link indicated in the ‘Windows Store OEM Program Guide’ posted on the Partner Portal;
 - (3) are processed and serviced or updated via the Windows Store infrastructure; and
 - (4) are preinstalled on Embedded Systems. 13 10/1/18
- (b) “Windows Store” is a feature of this Product and is an internet-based service provided by MS or an MS Affiliate that allows Company to submit Apps for MS certification, and then download and preinstall certified Apps.
- (c) **Program Requirements.** To participate in the App Servicing Program, Company must comply with the terms of this AT and the ‘Windows Store OEM Program Guide.’
- (d) **Enrollment.** Company must follow the enrollment process as outlined in the ‘Windows Store OEM Program Guide.’
- (e) **Warranties.** MS provides the Windows Store “as is.” Company understands and acknowledges that Embedded Systems and telecommunications systems are not fault-free and occasional periods of downtime may occur. Company further agrees that MS will not have any responsibility or liability related to availability, speed, security, errors, or data loss arising out of use of the Windows Store. Windows Store use (including Apps submission) by End Users or developers is governed by separate terms.

30. Audio Visual (AV) Technologies

- (a) AV Technologies for Windows 10 IoT Products

- (1) For H.264/AVC Visual Standard, the VC-1 Video Standard, and the MPEG-4 Visual Standard, MPEG LA, LLC requires this notice:
 This Product is licensed under the AVC, the VC-1 and the MPEG-4 Part 2 Visual patent portfolio licenses for the personal and non-commercial use of a consumer to (i) encode video in compliance with the above standards (“Video Standards”) and/or (ii) decode AVC, VC-1 and MPEG-4 Part 2 Visual that was encoded by a consumer engaged in personal and non-commercial activity or was obtained from a video provider licensed to provide such video. None of the licenses extend to any other product regardless of whether such product is included with this product in a single article. No license is granted or will be implied for any other use. Additional information may be obtained from MPEG LA, LLC. See www.mpegl.com.
 To the extent that non-Product software includes AV Technologies licensed by MPEG LA, LLC under a product category, such license agreement will determine any royalties due for AV Technologies included in non-Product software.
- (2) **High Efficiency Video Coding / H.265 Codec.** Windows 10 IoT Enterprise Products include an implementation of the High Efficiency Video Coding (HEVC) / H.265 video compression standard. Company agrees that it is responsible for any licensing obligations related to HEVC/H.265.
- (3) **Dolby Codecs.** Dolby Laboratories, Inc. requires the following notice:
 “This Product includes audio encoding and decoding technology from Dolby Laboratories. Microsoft has licensed Dolby’s two-channel decoder for use in this Product. Company is not licensed for Dolby Digital Plus decoder for decoding more than two channels and the Dolby Digital consumer encoder, and Company must separately license such technologies from Dolby. Company agrees to obtain the license(s) and to pay applicable royalties and other fees. Dolby considers failure to obtain such licenses to be infringement of Dolby Laboratories intellectual property rights. Company may apply for a license from Dolby Laboratories using the following URL:
<http://www.dolby.com/professional/technology/licensing/getting-licensed.html>
 If you have questions for Dolby Laboratories, Company may contact Dolby Laboratories at the following email address:
 licensinginquiries@dolby.com
 Dolby, Dolby Digital Plus, Dolby Digital Stereo Creator and the double-D symbol are registered trademarks of Dolby Laboratories. Any use of those marks requires a separate license from Dolby.” 14 10/1/18
- (4) **MPEG-2 Transport Stream.** This Product supports processing of data in an MPEG-2 Transport Stream container. Company agrees that it is responsible for any licensing obligations related to the MPEG 2 Transport Stream.
- (5) **MPEG-2 Codec.** Windows 10 IoT Enterprise Products also include MPEG-2 visual decoding and encoding technologies, which are disabled. Company agrees that it is responsible for any licensing obligations related to the MPEG-2 codec.
- (6) **Opus, VP9 Codec and Successors.** Starting with Product releases in 2016, Windows 10 IoT Products also include Opus audio decoding and encoding technologies and VP9 (and successor) visual decoding and encoding technologies. Company agrees that it is responsible for any licensing obligations related to such technologies.

31. Windows 10 IoT Enterprise Product Disclaimers / Notices.

All notices required under this AT must be provided in a clear and conspicuous manner to End Users before they acquire the Product. For example, Company may provide the notice on Websites and/or in sales and marketing materials. Company may modify the notices below and substitute a different URL, if the modified statement and the Web pages to which the URL links provide disclosures that conform to the requirements of this AT. All notices required under this AT must at a minimum be in the base language of the Product preinstalled on the Embedded Systems.

In addition to the specific notices set forth in this AT, Company must distribute Embedded Systems with all other consumer disclosures and notices required under applicable laws. MS may require that Company provide to its End Users such additional notices as MS deems reasonably necessary. If MS determines that any such additional End User notice is necessary, Company will provide the notice to End Users within a commercially reasonable time after MS informs Company of the requirement, unless MS otherwise specifies the time by which the notice must be provided

- (a) An Embedded Systems preinstalled with a Windows 10 IoT Enterprise Product that is distributed with a DirectX 9 class Graphics Processor Unit (GPU) must include notice of that fact and the fact that some advanced games and programs may need a DX10 or higher GPU for superior performance and graphics. Company must use the following or substantially similar notice:
 “Graphics processor supports DirectX 9. Some games and programs may require DirectX 10 or higher for superior performance and graphics. Check www.windows.com/Windows10specs for details.”

- (b) An Embedded Systems that does not include hardware components required to support all the features of Windows 10 IoT Enterprise Products must include notice of the fact that advanced hardware may be required to take advantage of the advanced features of the Windows 10 Family Products. Company must use the following or substantially similar notice:

“Some [insert Product edition name] features – such as [insert feature capability description, e.g., Windows Hello, Cortana with voice, support for 5-point touch, USB peripheral support] – may require advanced hardware. Check [oem.com/pagename] for details.”
- (c) For Windows 10 IoT Enterprise Products distributed into Iran, Company must provide to End Users, and cause its Channel Partners to provide to End Users, as applicable, the following or substantially similar notice:

“Some features and functionality of Windows that are dependent on electronic transactions may not be supported in Iran. Examples include, but are not limited to, Windows Store apps, games, music and movies & tv purchases.”

Company agrees that it will not market or advertise, and will cause its Channel Partners not to market or advertise, any features or functionality that are unavailable in Iran, including Windows Store apps, games (and any preinstalled apps that cannot be updated or reinstalled), music and movies & tv purchases. 15 10/1/18
- (d) For Products that include Cortana, Company agrees that it will not market or advertise, and will cause its Channel Partners not to market or advertise, Cortana in countries where the service is unavailable. Cortana is currently available in the United States, the United Kingdom, China, France, Italy, Germany, and Spain. Check www.microsoft.com/Windows10specs for updates. When marketing where Cortana is available, add:

“Cortana experience may vary by device.”
- (e) An Embedded Systems preinstalled with a Windows 10 IoT Enterprise Product that is marketed and distributed with the Skype translator feature must include notice that this is not available in all languages. Company must use the following or substantially similar notice:

“Skype translator feature is only available in the all-in-one desktop app in Spanish, English, French, Italian, German, and simplified Chinese.”
- (f) An Embedded Systems preinstalled with a Windows 10 IoT Enterprise Product that is marketed and distributed with the People feature must include notice that this feature is only supported per mobile operator availability. Company must use the following or substantially similar notice:

“One-touch video call within the People feature is only available with supported mobile operators.”

32. [Intentionally left blank].

33. Entry Embedded Systems Hardware Requirements

- (a) Company may only distribute this Product on Embedded Systems (or Field Systems, if upgrade Product) that utilize an approved processor listed on the “Entry” Section of the Processor List, posted on Partner Portal, as updated from time to time.
- (b) **Default Charges.** Each Embedded Systems (or Field Upgrade Image, if upgrade Product) distributed by or for Company that does not comply with the requirements of section (a) of this AT is subject to a Default Charge equal to 130% of the royalty associated with the Product eligible to be distributed with the Embedded Systems (as identified on the appropriate Processor List).

34. Value Embedded Systems Hardware Requirements

- (a) Company may only distribute this Product on Embedded Systems (or Field Systems, if upgrade Product) that utilize an approved processor listed on the “Value” Section of the Processor List, posted on the Partner Portal, as updated from time to time.
- (b) **Default Charges.** Each Embedded Systems (or Field Upgrade Image, if upgrade Product) distributed by or for Company that does not comply with the requirements of section (a) of this AT is subject to a Default Charge equal to 130% of the royalty associated with the Product eligible to be distributed with the Embedded Systems (as identified on the appropriate Processor List).

35. High End Embedded Systems Hardware Requirements

- (a) Company may only distribute this Product on Embedded Systems (or Field Systems, if upgrade Product) that utilize an approved processor listed on the “High End” Section of the Processor List, posted on the Partner Portal, as updated from time to time.
- (b) **Default Charges.** Each Embedded Systems (or Field Upgrade Image, if upgrade Product) distributed by or for Company that does not comply with the requirements of section (a) of this AT is subject to a Default Charge equal to 130% of the Windows 10 IoT Enterprise High End Product.

36. Thin Client Device Limitations

- (a) For Embedded Systems that are designed and marketed as Thin Client Devices, Company may include terminal services protocols (such as Remote Desktop Protocol or Independent Computer Architecture) to enable Thin Client Devices to connect to and access applications running on a server.
- (b) Company may allow Thin Client Devices to use Internet browsing functionality to connect to and access cloud hosted applications (for example, Microsoft Office 365). 16 10/1/18

- (c) Company shall not allow any Desktop Functions to run locally on Thin Client Devices and shall advise End Users of this requirement in the License Terms for the Product.
- (d) For Embedded Systems that are designed and marketed as Thin Client Devices, Company may run one or more of the following applications locally:
 - (i) Remote desktop software (e.g. RDP client, Citrix);
 - (ii) Device management software (e.g. SCCM, MDM, security apps);
 - (iii) Media player;
 - (iv) Browser;
 - (v) Anti-malware software; or
 - (vi) Anti-virus software;
 - (vii) PDF Viewers., provided that Viewers do not offer productivity functionality or the ability for end users to upgrade the Viewers to offer productivity functionality.

For purposes of this AT, "Thin Client Device" means an Embedded Systems that depend heavily on some other computer (may be a server) to fulfill its computational roles; and "Desktop Functions" means consumer or general purpose tasks or processes (such as using word processing, spreadsheet, or slide show presentation software) performed exclusively or primarily by a PC device.

37. Intellectual Property Infringement. Section 6(a)(2) Coverage and 6(b)(2) (Patent Claims) of the Agreement are replaced with the following:

- (a) **Coverage**
 - (1) infringe any patents (except for patents that are alleged to be infringed by or essential to an implementation of any Standards) or of any visual or audio decoding or encoding technologies; and
- (b) **Patent Claims**
 - (1) **Generally.** MS obligations for any patent Claims are limited to patent Claims where the Product (excluding Sample Code) software alone, without combination or modification, either: (i) directly infringes an asserted patent claim; or (ii) embodies all the essential inventive elements of an asserted patent claim.
 - (2) **Standards-Based Patent Claim.** Notwithstanding the foregoing, MS has no obligation or liability with regard to infringement Claims for any patents that are alleged to be infringed by, or essential to, the implementation of any Standards, the Opus audio codec, the VP9 video codec and any visual or audio decoding or encoding technologies.

38. Windows as a Service

- (a) To maintain serviceability support, Company must meet all requirements as outlined in this AT.
- (b) Company must pre-configure this Product for Servicing in alignment with the Semi-Annual Channel (formerly known as the Current Branch for Business) as outlined at <https://docs.microsoft.com/en-us/windows/deployment/update/waas-configure-wufb>
- (c) Microsoft will release Product Supplements to support the Semi-Annual Servicing (SAC) servicing model. Each SAC is a Required Supplement to the Product.
- (d) Notices. Company must ensure that End Users of this Product are notified of all servicing requirements. Company must use the following or substantially similar notice:
 "To maintain Operating System (OS) servicing support from Microsoft, this product requires ongoing installation of new upgrades and updates. Contact the device manufacturer for more information or refer to the following details on microsoft.com: <https://docs.microsoft.com/en-us/windows/deployment/update/>"

39. Additional Processor Requirements for Windows 10 IoT and Windows Embedded Products

- (a) **General.** Company may only Distribute these Products with an Embedded System that meets the Processor Requirements for these Products.
- (b) **Updates.** Microsoft may add new Processors to the Processor Requirements at any time with notice to Company. Microsoft may modify the Processor Requirements upon no less than 90 days' notice to Company.
- (c) **Other Requirements.** The requirements in this AT are in addition to other hardware requirements, including processor limitations associated with Product pricing, and processor limitations in the Minimum Hardware Requirements for this Product.

40. Hardware Requirements for Windows 10 IoT Products

All Embedded Systems that include Windows 10 IoT Products must meet:

- (a) The hardware configuration requirements (listed by applicable Product) in the Processor List. If a Windows 10 IoT Product has a Processor requirement, Company must only use a Processor listed on the designated Processor List for that Product.
- (b) The Minimum Hardware Requirements for Windows 10 IoT Products specified in the document located at [https://msdn.microsoft.com/library/windows/hardware/dn915086\(v=vs.85\).aspx](https://msdn.microsoft.com/library/windows/hardware/dn915086(v=vs.85).aspx) (or updated URL) ("Minimum Hardware Requirements").

- (c) Microsoft may update the Minimum Hardware Requirements for Windows 10 IoT Products upon no less than 120 days' notice to Company.
- (d) Embedded Systems installed with Downgrade Software must follow all the Minimum Hardware Requirements for Windows 10 IoT, unless otherwise noted in such requirements or Additional Terms.

41. Migration Rights. The terms of the CLA Migration Rights Schedule are hereby replaced with the following:

MIGRATION RIGHTS SCHEDULE

1. ADDITIONAL DEFINITIONS

"Delivery Date" means the date when the Migration System is distributed to the End User.

"Extended Support End Date" means the last date that Microsoft offers extended support for the Product as published at Microsoft Lifecycle Policy at <https://support.microsoft.com/en-us/lifecycle/search>

"Final Software" means the Product in the Image licensed under the Agreement that must be permanently installed on the Migration System before the end of the Migration Period. Final Software is a successor version of Prior Software.

"Migration Period" means the shorter of:

- (a) either:
 - (i) the 12-month period following the Delivery Date of the Migration System; or
 - (ii) for Migration Systems requiring industry certification or industry regulatory compliance authorization post-delivery, the 24-month period following the Delivery Date of the Migration System;

OR

- (b) the period from Delivery Date to the Extended Support End Date.

"Migration System(s)" means Embedded System(s) that have not been previously distributed and that comply with the descriptions set forth in Sections 2(i) and (ii) below.

"Prior Software" means a Product in the Image licensed under the Agreement installed on the Migration System temporarily, either before or during the Migration Period.

2. Migration Systems Distribution

Upon the specific written request of an End User, Company may distribute Migration Systems as described in (i) through (iii) below, provided that Company complies with all the terms of this Schedule.

- (i) distribute Migration Systems to that End User that contain an Image that includes the Prior Software on a temporary basis, and then migrate those Migration Systems by installing them with an Image containing the Final Software within the Migration Period;
- (ii) distribute Migration Systems to that End User that contain an Image that includes the Final Software, migrate those Migration Systems on a temporary basis to an Image containing the Prior Software, and then migrate those Migration Systems back to an Image containing the Final Software by installing the Final Software within the Migration Period; and
- (iii) both Final Software and Prior Software must be distributed with the Migration System at the same time.

- 3. **Migration Table and Processor Requirements.** The Final Software must be associated with the Prior Software as listed in the Migration Table posted on the Partner Portal. If Company is Distributing an Embedded System under the terms of this Migration Rights section, that Embedded System must meet both: (i) the Processor Requirements for the Final Software; and (ii) the Processor Requirements for the Prior Software. For clarity, if an Embedded System has a Processor that does not meet the Processor Requirements for the Prior Software requested, Company may not Distribute the Embedded System with Migration Rights. For example, Company may only Distribute an Embedded System with Windows 7 Professional for Embedded Systems (the Prior Software) and Windows 10 IoT Enterprise SAC High End (the Final Software), if that Embedded System meets both the Processor Requirements for Windows 7 Professional for Embedded Systems and the Processor Requirements for the Windows 10 IoT Enterprise SAC High End licensed Product.

- 4. **End of License.** Company may not, in any event, distribute either the Prior Software or the Final Software after its respective Microsoft End of License date.

- 5. **Updates.** Company must include all required Updates for the Prior Software on any Migration System distributed with the Prior Software, and for the Final Software on any Migration System distributed with the Final Software.

- 6. **COA/APM Distribution. In accordance with the Agreement, Company**

- (a) shall affix a COA for the Final Software to each Migration System, and
 - (b) shall distribute any required APM with each Migration System.

7. **Recovery Images.** Company shall distribute a Recovery Image containing the Final Software (“Final Software Image”) and a Recovery Image containing the Prior Software (“Prior Software Image”) to the End User together with the Migration System. Company shall distribute Final Software Images either on Recovery Media or via Company’s website as a download in accordance with the Agreement. Company may only distribute the Prior Software Image on the Embedded System, either on a separate partition or a separate hard disk drive on the Embedded System.
8. **End User Requirements**
 - (a) Company must advise the End User that the Final Software Image may only be installed onto additional units of the same model of Migration System if:
 - (i) Company elects to provide the End User with only a single copy of the Final Software Image on external media for installation on more than one Migration System, or
 - (ii) End User installs the Final Software Image via the End User’s internal network.
 - (b) Company shall establish a commercially reasonable procedure to ensure End Users do not concurrently use both the Final Software and the Prior Software on the Migration Systems. Without limitation of the foregoing requirement, Company shall require the End User to destroy the Image containing the Prior Software and to erase any and all copies of the Prior Software after the installation of the Image containing the Final Software on the Migration System. Prior Software must be removed from the Migration System on or before the end of the Migration Period.
9. **License Terms.** For Migration Systems, Company must include the following additional terms in the “Grant of Software License” section of the License Terms for the Final Software:

“Use of Previous Version of the Product. If the Certificate of Authenticity that accompanies the DEVICE identifies the SOFTWARE as Microsoft® Windows® <name of Final Software> (the “Final Software”), then in lieu of using Final Software, you may request that [OEM Parties] install [[or, if agreed, in writing, with [OEM Parties] you may install yourself]], and may temporarily use, Microsoft® Windows® <name and version of Prior Software> (the “Prior Software”) on the DEVICE, provided: (1) the Prior Software is deemed “SOFTWARE” for the purposes of these License Terms and use of the Prior Software shall be in compliance with all the terms of these License Terms; (2) you do not simultaneously use both versions of the SOFTWARE on the DEVICE; (3) you do not loan, rent, lease, lend or otherwise transfer the recovery media or back-up copy of either version of the SOFTWARE to another end user, except as otherwise provided in the transfer provisions of these License Terms; (4) [unless otherwise agreed with [OEM Parties]], you allow only [OEM Parties] perform the upgrade from the Prior Software to the Final Software; and (5) upon upgrading to the Final Software you erase any and all system copies of the Prior Software.”

42. **Downgrade Rights.** The terms of the CLA Downgrade Rights Schedule are hereby replaced with the following:

DOWNGRADE RIGHTS SCHEDULE

1. ADDITIONAL DEFINITIONS

“Downgrade Image” means an Image customized for a specific Enterprise Customer that includes Downgrade Software, and may include customer-requested applications, drivers and other customizations to the Embedded Application or Embedded System.

“Downgrade Image System” means an Embedded System with a preinstalled Downgrade Image.

“Downgrade Software” means a prior version of the Product that is no longer available for distribution by Company under the Agreement.

2. Additional Rights

- (a) Subject to the terms of this Downgrade Rights Schedule and Company’s compliance with those terms, Company may, at the specific request of an Enterprise Customer:
 - create a Downgrade Image using an image provided by the Enterprise Customer;
 - preinstall that Downgrade Image on Embedded Systems; and
 - distribute the Downgrade Image System directly to the requesting Enterprise Customer.
- Downgrade Rights only apply to a Downgrade Image System that has not been distributed.

3. **Software Versions.** The Product included in the Downgrade Image must be listed as an End of Licensed Product to the Eligible Product on the Downgrade Table as posted on Partner Portal. The Eligible Product listed on the Downgrade Table must appear on the affixed COA distributed with the Downgrade Image System. The foregoing also applies to Recovery Solutions for a Downgrade Image System.

4. DOWNGRADE IMAGES INSTALLED BY COMPANY.

- (a) Company must be licensed for the Product that appears on the affixed COA distributed with the Downgrade Image System.
- (b) If Company was previously licensed for Downgrade Software and has retained the Installation Tools for the Downgrade Software, then Company may only use the preinstallation tools in the Installation Tools

- for the Downgrade Software to capture and install the Downgrade Image on the Downgrade Image System.
- (c) An Enterprise Customer must provide an image that includes Downgrade Software to the Company.
 - (d) Company may choose not to provide a Recovery Solution.
5. **Indemnity.** Company will indemnify and defend Microsoft and Microsoft Affiliates from and against any damages, claims, costs, judgments (or settlements to which Company consents) and expenses (including reasonable attorneys' fees) arising from any unlicensed software on the Downgrade Image (including all Microsoft software, unless Company has taken commercially reasonable steps to verify the Enterprise Customer has a valid license for those products). Microsoft reserves the right, in its sole discretion, to assume at any time the defense of any such claim arising from any unlicensed Microsoft software installed on the Downgrade Image. Any amount due to Microsoft or Microsoft Affiliates under this section will be reduced by the amount, if any, of any Default Charges already paid to Microsoft by Company for the unlicensed software products on the Downgrade Image(s). The indemnity in this section will survive termination or expiration of the Agreement.
6. **No Support.** Microsoft has no obligation to provide support for Downgrade Software under this Agreement.
7. **Other Duties.** Company must comply with the Agreement with respect to the release of any required Updates for the Product included in the Downgrade Image.
8. **Processor Requirements.** A Downgrade Image System must meet both: (i) the Processor Requirements for the licensed Product eligible for downgrade; and (ii) the Processor Requirements for the Downgrade Software. For clarity, if Downgrade Image System has a Processor that does not meet the Processor Requirements for the Downgrade Software requested, Company may not Distribute the Downgrade Image System.

43. Field Upgrade Rights. The terms of the CLA Field Upgrade Rights Schedule are hereby replaced with the following:

FIELD UPGRADE RIGHTS SCHEDULE

1. ADDITIONAL DEFINITIONS.

"Existing Image" means

- (1) an Image that includes a prior version of the Microsoft Binaries, or
- (2) a software image that includes an operating system different from the Product contained in the Field Upgrade Image.

"Field System" means

- (1) an Embedded System, or
- (2) another company's system that meets the requirements for an Embedded System (except that it does not include a Product or other Microsoft operating system product), that has been distributed to an End User and that contains an Existing Image.

"Field Upgrade Image" means an Image containing a Product licensed under the Agreement that Company distributes to End Users of Field Systems.

2. Field Upgrade License and Processor Requirements. Microsoft grants Company the right to copy and distribute Field Upgrade Images directly to End Users for the purpose of replacing existing software on certain Field Systems if all of the conditions below are, and remain, satisfied. In addition, Field Upgrade Images may only be distributed on Field Systems that meet the Processor Requirements for the Field Upgrade Image.

3. Design.

- (a) Company may engage an Authorized Subcontractor to create Field Upgrade Images on its behalf, provided that Company ensures that the Authorized Subcontractor distributes the resulting Field Upgrade Image only to Company.
- (b) Company (or its Authorized Subcontractor acting on its behalf) must ensure that the Field Upgrade Image is useable only on the applicable Field System. Before the End User can use the Field Upgrade Image, Company (or its Authorized Subcontractor) must ensure that a commercially reasonable authentication of the Field System is performed.
- (c) When installed, the Field Upgrade Image must completely replace the Existing Image (End User data and/or End User configuration settings may remain intact). The Field Upgrade Image must erase or permanently disable the Existing Image.
- (d) Upon installation of the Field Upgrade Image on a Field System, the Field System must meet all requirements of an Embedded System as set forth in the Agreement.

4. COAs

Company must distribute one COA affixed to the External Media packaging of each copy of a Field Upgrade Image. However, COAs are not required for:

- (a) copies of Field Upgrade Images placed in use on additional units of the same model of Field System over an End User's network (such as a server) as allowed in this section;
 - (b) copies of Field Upgrade Images downloaded by an End User as allowed under Section 3(f) (End User Downloads); or
 - (c) copies of Field Upgrade Images for Products that do not require COAs.
- Notwithstanding subsection (a) through (c) above, if Company elects to obtain COAs for Field Upgrade Images, Company must affix a COA on the Embedded System or distribute a COA on a card, as specified in the IoT Operations Handbook.

5. Distribution and Installation.

- (a) Company and its Channel Partners may distribute one Field Upgrade Image to each End User of a Field System only to upgrade the End User's Field System. The Field Upgrade Image must be installed only on a Field System. Field Upgrade Images may be distributed in either:
 - (i) on External Media, or
 - (ii) via Company's restricted access website as a download, as provided in Section 3(f) (End User Downloads).
- (b) Multiple Units
 - (i) Some End Users may have more than one unit of the same Field System with the same Existing Image. Such End Users may use one copy of the Field Upgrade Image to install such Field Upgrade Image on to multiple units of the same Field System through a server deployment.
 - (ii) Company shall advise such End Users that the Field Upgrade Image may only be installed onto additional units of the same model of Field System. Company agree to include in the License Terms for such End Users the number of units authorized. (For example, "Authorized Number of Installations of Software = ____").

6. **End User Notices.** Company will require End Users to keep the Field Upgrade Image if originally delivered on separate media. Once a Field Upgrade Image is installed, the End User may use the Field Upgrade Image on its original media as a Recovery Image. Company shall establish a commercially reasonable procedure to assure the return or destruction of any replaced Recovery Image media.

7. **License Terms.** Company must use the License Terms to license a Field Upgrade Image distributed in accordance with this Schedule (Field Upgrade Rights).

44. Leasing Schedule. The terms of the Leasing Schedule are hereby replaced with the following:

LEASING SCHEDULE

1. OEM Leases to End Users

Company may install and distribute the Product on Embedded Systems that Company rents or leases to End Users ("Lessees"), including leases intended to create a security interest consistent with Section 2 of this Leasing Schedule subject to the following requirements:

- (a) Company must enter into a written lease agreement with each Lessee ("Lease"):
 - (1) The Lease must be for a term of at least six consecutive months;
 - (2) The Lessee must make payments over the term of the Lease;
 - (3) The Lessee cannot terminate its payment obligations; and
 - (4) At the end of the Lease, the Lessee must renew the Lease, purchase the Embedded Systems, or return them to Company, with all copies of the Product, the COA and any APM.
- (b) Any returned Embedded System must include the COA and any APM. Company may not return the COAs for credit. Company must destroy, and keep records of the destruction of, any returned COAs or recovery media or APM unless Company redistributes it as allowed in Section 4 (Re-Distribution of Embedded Systems) of this Licensing Schedule.
- (c) At the end of this Agreement, Company may allow each Lessee to continue to use the Product for the remaining term of its then-current Lease. This Section 1(c) will survive termination or expiration of this Agreement.
- (d) Except as provided in this Leasing Schedule, Company may not rent or lease Embedded Systems to End Users.

2. OEM Finance Lease

In addition to the lease rights above, in accordance with Section 1(a) of this Leasing Schedule, Company may only engage an entity that is an Affiliate Lessor (as defined below) to lease or rent Embedded Systems to Lessees, provided that:

- (a) "Affiliate Lessor" is an entity that directly or indirectly controls, is controlled by, or is under common control with Company,

- (b) Company shall defend, indemnify, and hold MS harmless from and against all claims and damages, including, without limitation, attorneys' fees, arising from or related to any violation by Company or the Affiliate Lessor of the terms of this Leasing Schedule, and
- (c) Company shall remain the licensing party to the End User under the License Terms for the leased Product.

3. Enterprise Customer Lease to Franchisee.

In the License Terms, Company may grant an Enterprise Customer the right to rent or lease Embedded Systems to entities that have a valid current franchise agreement with the Enterprise Customer ("Franchisee"), subject to the following:

- (a) Enterprise Customer must enter into a written lease agreement complying with the lease requirements in Section 1(a) of this Leasing Schedule with the Franchisee for each Embedded System.
- (b) Each lease shall terminate if the Franchisee loses its Franchisee status.
- (c) Enterprise Customer may re-lease each Embedded System. Each re-lease must also meet the requirements of this Section 3. The re-lease must include all copies of the Product, the COA and any APM.

4. Re-Distribution of Embedded Systems

If Company complies with Sections 1 (OEM Leases to End Users) and 2 (OEM Finance Lease) of this Schedule, then Company may re-lease, resell, or transfer a returned or previously-leased Embedded System. Each re-lease or sale must include all copies of the Product, the COA, and any APM.

(a) Same Product

- (1) Company may preinstall a copy of the Product that corresponds to the Product version and edition originally licensed for the Embedded System, as long as Company is licensed for that Product at the time of installation.
- (2) If the Product version originally licensed for the Embedded System is for a Product that is not licensed in the Agreement at the time of installation, then Company may install that Product only (i) if it is licensed to do so under a separate agreement with MS or an MS Affiliate; or (ii) by exercising rights as an end user of that Product under the License Terms. Company may use the recovery media returned by the Lessee or the End User to exercise those rights or use any extended OPK rights granted in this Agreement or ATs.
- (3) No royalty will accrue for a re-installation and redistribution under this Section 4(a).
- (4) Company may purchase replacement APM, if available, to distribute with each Embedded System.
- (5) Company may not return the COA from a previously leased Embedded System for credit.
- (b) **Different Product. Company may preinstall and distribute a different Product on the Embedded System, so long as the Embedded System meets the Processor Requirements for the Product. In addition, Company must:**
- (1) Removes the original Product, destroys any APM and keeps records of each removal and destruction;
- (2) Affixes the COA for the Product preinstalled under this Section 4(b) directly to the Embedded System over the COA previously affixed to the Embedded System; and
- (3) Pays the royalty rate for the Product installed under this Section 4(b).

45. Windows containers

- (a) Customers may use any number of virtual Operating System Environments (OSE) instantiated as Windows containers by the Microsoft Azure IoT Edge runtime on the device.
- (b) Available for commercial use when used with Microsoft Azure IoT Edge.

46. No COAs

There are no COAs for this Product. However, there is an optional tracking label for the Windows 10 IoT Core Product that may be acquired from a MS Distributor. Optional tracking label is not required to be affixed for the Product.

47. Zero Royalty Terms

- (a) **Default Charge.** The Default Charge for this Product is \$0.00.
- (b) **Amounts Owed; Audit Costs.** Section 8(d)(2)(Amounts Owed; Audit Costs) of the Agreement is replaced with the following:
 - (2) MS will bear the cost of audit expenses for verifying compliance with Section 15(b) (Anti-Corruption and Anti-Money Laundering Prohibition). For any other audit, if the audit reveals a Material Discrepancy, Company must pay MS the costs of the audit, in addition to any unpaid amounts due. "Material Discrepancy" means a material breach of this Agreement.
- (c) **Limitations of Liability.** Section 5 (MS Liability) of the Agreement are replaced with the following:
 - (a) **MS Liability.** Each party's total cumulative liability (if any) to the other party under this Agreement (and the other party's exclusive remedy for any such liability) shall be limited to the other party's direct damages for claims arising under this Agreement up to an amount not to exceed \$1,000,000 U.S. Dollars under the Agreement. The preceding sentence does not apply, however, to (i) Company's unauthorized use of Microsoft or an MS Affiliates intellectual property (including violation of any part of Section 2 (License Grant Limitations), (ii) Microsoft's liability under Section 6

(Intellectual Property Infringement), (iii) breach of Section 9 (Non-Disclosure), or (iv) breach of Section 15 (Government Regulations).

- (b) Updates.** If connected to the Internet, the Image will periodically check, download and install Updates to enhance Embedded System functionality and security. Company agrees to receive automatic Updates without any additional notice. MS recommends that Embedded Systems are periodically connected to the Internet at least once every month in order to check for and install any Updates. Company agrees not to disable, programmatically manipulate, or redirect the automatic updating capability of the Image. Only the Windows 10 IOT Core Product enables Company to change the Update settings for the Image.

48. Windows 10 IoT Core Services

This Product includes the following components: **(i)** MS Binaries and **(ii)** the Windows services more fully described below in this AT (“**Core Services**”). Company may distribute the MS Binaries and provision Core Services solely on new Embedded Systems in accordance with the terms of this AT (each, a “**Core Services Device**”).

- (a) MS Binaries.** MS will release separate MS Binaries for each LTSC of this Product (each, a “**MS Binaries LTSC Release**”). Company’s license to distribute any given MS Binaries LSTC Release on Core Services Devices ends the earlier of the End of License Date for such MS Binaries LTSC Release (as specified in the table below) or the expiration or termination of the Agreement.

Windows 10 IoT Core Services MS Binaries LTSC Release Date	MS Binaries LTSC Release End Item Part Number	MS Binaries LTSC Release End Item Description	MS Binaries LTSC Release End of License Date
October 1, 2018	X21-96389	SW DVD9 Windows 10 IoT Core 1809 ARM32/ARM64/32/64 EMB English OEM	November 30, 2028

MS will update this AT with each subsequent MS Binaries LTSC Release prior to the release date of each subsequent MS Binaries LTSC Release.

- (b) Core Services.** Subject to the terms of this AT, Company may also provision Core Services on a Core Services Device on which the MS Binaries have been installed for distribution to an End User. This Product includes the following Core Services for managing the delivery of updates and monitoring device health over-the-air (OTA) when distributed to an End User and connected to the Internet. For information related to Core Services SLA please refer to <https://azure.microsoft.com/en-us/support/legal/sla/>.

- (1) Update Control** is a service that provides Company the ability to create, customize and control the delivery of updates to a distributed Core Services Device as outlined in the DUC Deployment Guide on the Partner Portal. For purposes of this AT, updates may include the following:

- (i) MS Binaries update(s)
- (ii) Company Binaries
- (iii) Subsequent MS Binaries LTSC Release(s)

Company may only deliver updates to a distributed Core Services Device that has paid Core Services coverage as defined in (c) below. In addition, subsequent MS Binaries LTSC Release(s) may only be delivered to a distributed Core Services Device provided the device:

- (i) technically supports the Update
- (ii) meets the Processor Requirements

- (2) Device Health Attestation (DHA)** is a service that evaluates device health and can be combined with a device management system (e.g., Azure IoT Device Management). Based on DHA report data, the device management system can take corrective actions.

MS may make additional Core Services available from time to time. MS will update this AT with additional Core Services prior to their release.

(c) Core Services Duration, Extension and Expiration

- (1) Duration.** Each Core Services Device distributed by Company under this AT, is entitled to receive Core Services for a period of 10 years, beginning as of the date of Product purchase from MS, as defined and specified within Company’s submitted Sales Order Report (SOR).

- (2) Extension of Core Services on Core Services Devices.** MS will notify Company within 180 days of Core Services duration expiration to purchase additional period(s) of Core Services. For Core Services Devices distributed by Company under this AT, any additional extension of Core Services period(s) will

only be offered by MS under a separate agreement and through a separate Microsoft services commerce platform.

- (3) **Expiration of Core Services on Core Services Devices.** If Company has not purchased additional Core Services to extend the Core Services for Core Services Devices prior to the 10-year expiration date, MS reserves the right to disable Core Services for any Core Services Device or DUC for which the original 10-year services have expired.

49. Retail Point of Service Application

(a) Definitions

- (1) "POS" means point of service.
 - (2) A "Retail POS System" means a Embedded System that performs functions substantially similar to that of a point of sale, kiosk (informational or transactional), digital signage, or similar types of devices; is designed for use solely with a POS Application; and is distributed to a Retail Environment.
 - (3) A "POS Application" means a software application which provides only the following functions:
 - (i) process sales and service transactions, scan and track inventory, record and/or transmit customer information, and perform related management functions; and/or
 - (ii) provide information directly and indirectly to customers about available products and services.
 - (4) A "Retail Environment" means physical location where the primary activity is the sale of goods and services to consumers; examples include grocery stores, retail pharmacies, department stores, hotels, and restaurants.
- (b) Company are not required to distribute an Embedded Application as part of an Image that includes this Product when distributing Product with a Embedded System that is a Retail POS System.
- (c) Company may enable their End Users and Channel Partners to install POS Applications on Retail POS Systems. Company also may enable their End Users and Channel Partners to install Viewers to support use of the POS Application. A "Viewer" is a utility program that allows a user to view a file in its native format without providing the functions to make changes to files. Each End User must be separately licensed to use each Viewer.
- (d) Microsoft is not responsible for testing or ensuring that POS Applications are suitable for the Retail POS Systems. Microsoft also will not provide technical support for the installation or use of the POS Application.
- (e) Microsoft has not tested Windows Updates with POS Applications, and does not warrant or guarantee that Windows Updates will work with POS Applications. Windows Updates may not be suitable for use with POS Applications and may malfunction and/or cause harm to the Retail POS System or persons or property.

Company therefore acknowledge and agree that Microsoft has no responsibility for any such harm or malfunction.

12. Certificaciones WLAN

País	XENTRY Diagnosis VCI	XENTRY Diagnosis Pad 2
Afganistán	no certificado	certificado
Albania	certificado	certificado
Alemania	certificado	certificado
Andorra	certificado	certificado
Angola	no certificado	certificado
Ant. Neerl. - Curazao	certificado	certificado
Ant. Neerl. - San Martín	certificado	certificado
Antigua y Barbuda	certificado	certificado
Arabia Saudita	certificado	certificado
Argelia	certificado	certificado
Argentina	certificado	certificado
Armenia	certificado	certificado
Aruba	no certificado	certificado
Australia	certificado	certificado
Austria	certificado	certificado
Azerbaiyán	certificado	certificado
Azores	certificado	certificado
Bahamas	certificado	certificado
Bahréin	no certificado	certificado
Bangladesh	certificado	certificado
Barbados	no certificado	certificado
Bélgica	certificado	certificado
Belice	no certificado	certificado
Benín	no certificado	certificado
Bermudas	certificado	certificado
Bielorrusia	certificado	no certificado
Bolivia	no certificado	certificado
Bonaire	no certificado	certificado
Bosnia-Herzegovina	certificado	certificado
Botsuana	no certificado	certificado
Brasil	certificado	certificado
Brunéi	certificado	certificado
Bulgaria	certificado	certificado
Burkina Faso	certificado	certificado
Burundi	no certificado	certificado
Bután	no certificado	certificado
Cabo Verde	certificado	certificado
Camboya	no certificado	certificado

País	XENTRY Diagnosis VCI	XENTRY Diagnosis Pad 2
Camerún	no certificado	certificado
Canadá	certificado	certificado
Ceuta/Melilla	certificado	certificado
Chad	no certificado	certificado
Chile	certificado	certificado
China	certificado	certificado
Chipre	certificado	certificado
Chipre Norte	certificado	certificado
Ciudad del Vaticano	certificado	certificado
Colombia	certificado	certificado
Comoras	no certificado	certificado
Congo	no certificado	certificado
Corea del Norte	no certificado	no certificado
Corea del Sur	certificado	certificado
Costa de Marfil	no certificado	certificado
Costa Rica	no certificado	certificado
Croacia	certificado	certificado
Cuba	no certificado	no certificado
Dinamarca	certificado	certificado
Dominica	certificado	certificado
Ecuador	no certificado	certificado
EE. UU.	certificado	certificado
Egipto	certificado	certificado
El Salvador	certificado	certificado
Emiratos Árabes Unidos	certificado	certificado
Eritrea	no certificado	certificado
Eslovaquia	certificado	certificado
Eslovenia	certificado	certificado
España	certificado	certificado
Estonia	certificado	certificado
Etiopía	no certificado	certificado
Filipinas	certificado	certificado
Finlandia	certificado	certificado
Fiyi	no certificado	certificado
Francia	certificado	certificado
Gabón	certificado	certificado
Gambia	no certificado	certificado
Georgia	certificado	certificado
Ghana	certificado	certificado
Gibraltar	certificado	certificado

País	XENTRY Diagnosis VCI	XENTRY Diagnosis Pad 2
Granada	certificado	certificado
Grecia	certificado	certificado
Groenlandia	certificado	certificado
Guadalupe	no certificado	certificado
Guatemala	no certificado	certificado
Guayana Francesa	certificado	certificado
Guernsey	certificado	certificado
Guinea	no certificado	certificado
Guinea Bissau	no certificado	certificado
Guinea Ecuatorial	no certificado	certificado
Guyana	no certificado	certificado
Haití	no certificado	certificado
Honduras	no certificado	certificado
Hong Kong	certificado	certificado
Hungría	certificado	certificado
India	certificado	certificado
Indonesia	certificado	certificado
Irán	no certificado	no certificado
Iraq	no certificado	certificado
Irlanda	certificado	certificado
Isla de Man	certificado	certificado
Isla Pitcairn	certificado	certificado
Isla Reunión	certificado	certificado
Islandia	certificado	certificado
Islas Caimán	certificado	certificado
Islas Canarias	certificado	certificado
Islas de Åland	no certificado	certificado
Islas Feroe	no certificado	certificado
Islas Malvinas	certificado	certificado
Islas Marshall	certificado	certificado
Islas Salomón	certificado	certificado
Islas Turcas y Caicos	certificado	certificado
Islas Vírgenes Americanas	certificado	certificado
Islas Vírgenes Británicas	certificado	certificado
Israel	certificado	certificado
Italia	certificado	certificado
Jamaica	no certificado	certificado
Japón	certificado	certificado
Jersey	certificado	certificado
Jordania	certificado	certificado

País	XENTRY Diagnosis VCI	XENTRY Diagnosis Pad 2
Kazajistán	certificado	certificado
Kenia	certificado	certificado
Kirguizistán	no certificado	certificado
Kiribati	no certificado	no certificado
Kuwait	no certificado	certificado
Laos	certificado	certificado
Lesoto	no certificado	certificado
Letonia	certificado	certificado
Líbano	certificado	certificado
Liberia	no certificado	certificado
Libia	no certificado	certificado
Liechtenstein	certificado	certificado
Lituania	certificado	certificado
Luxemburgo	certificado	certificado
Macao	no certificado	certificado
Macedonia	certificado	certificado
Madagascar	no certificado	certificado
Madeira	certificado	certificado
Malasia	no certificado	certificado
Malawi	certificado	certificado
Maldivas	no certificado	certificado
Mali	no certificado	certificado
Malta	certificado	certificado
Marruecos	certificado	certificado
Martinica	certificado	certificado
Mauricio	no certificado	certificado
Mauritania	no certificado	certificado
Mayotte	certificado	certificado
México	certificado	certificado
Micronesia	certificado	certificado
Moldavia	certificado	no certificado
Mongolia	certificado	certificado
Montenegro	certificado	certificado
Mozambique	no certificado	certificado
Myanmar (Birmania)	no certificado	certificado
Namibia	no certificado	certificado
Nauru	no certificado	certificado
Nepal	no certificado	certificado
Nicaragua	certificado	certificado
Níger	no certificado	certificado

País	XENTRY Diagnosis VCI	XENTRY Diagnosis Pad 2
Nigeria	certificado	certificado
Noruega	certificado	certificado
Nueva Caledonia	certificado	certificado
Nueva Zelanda	certificado	certificado
Oceanía Americana	certificado	certificado
Oceanía Australiana	certificado	certificado
Oceanía Neozelandesa	certificado	certificado
Omán	no certificado	certificado
Países Bajos	certificado	certificado
Pakistán	certificado	certificado
Panamá	certificado	certificado
Papúa-Nueva Guinea	no certificado	certificado
Paraguay	no certificado	certificado
Perú	certificado	certificado
Polinesia Francesa	certificado	certificado
Polonia	certificado	certificado
Portugal	certificado	certificado
Puerto Rico	certificado	certificado
Qatar	certificado	certificado
Reino Unido	certificado	certificado
Rep. Dominicana	certificado	certificado
República Centroafricana	no certificado	certificado
República Checa	certificado	certificado
República Democrática del Congo	no certificado	certificado
Ruanda	no certificado	certificado
Rumanía	certificado	certificado
Rusia	certificado	certificado
Samoa	no certificado	certificado
San Bartolomé	no certificado	certificado
San Martín	certificado	certificado
San Martín (parte francesa)	certificado	certificado
San Pedro	certificado	certificado
San Vicente	no certificado	certificado
Santa Helena	certificado	certificado
Santa Lucía	no certificado	certificado
Santo Tomé y Príncipe	no certificado	certificado
Senegal	no certificado	certificado
Serbia	certificado	certificado
Seychelles	certificado	certificado
Sierra Leona	certificado	certificado

País	XENTRY Diagnosis VCI	XENTRY Diagnosis Pad 2
Singapur	certificado	certificado
Siria	no certificado	no certificado
Somalia	no certificado	certificado
Sri Lanka	no certificado	certificado
Suazilandia	no certificado	certificado
Sudáfrica	certificado	certificado
Sudán	no certificado	certificado
Sudán del Sur	no certificado	certificado
Suecia	certificado	certificado
Suiza	certificado	certificado
Surinam	no certificado	certificado
Tailandia	no certificado	certificado
Taiwán	certificado	certificado
Tanzania	certificado	certificado
Tayikistán	no certificado	certificado
Territorio Británico en Océano Índico	certificado	certificado
Territorios Palestinos	no certificado	no certificado
Timor Oriental	no certificado	certificado
Togo	no certificado	certificado
Tonga	no certificado	certificado
Trinidad y Tobago	no certificado	certificado
Túnez	no certificado	certificado
Turkmenistán	no certificado	certificado
Turquía	certificado	certificado
Tuvalu	no certificado	certificado
Ucrania	certificado	certificado
Uganda	no certificado	certificado
Uruguay	certificado	certificado
Uzbekistán	no certificado	no certificado
Vanuatu	no certificado	no certificado
Venezuela	no certificado	certificado
Vietnam	no certificado	certificado
Wallis y Futuna	no certificado	certificado
Yemen	certificado	certificado
Yibuti	no certificado	certificado
Zambia	certificado	certificado
Zimbabue	no certificado	certificado

Tabla 3: Certificaciones WLAN

13.FAQ: preguntas frecuentes

Novedades en el concepto de equipos

- ¿Qué se modificó si se compara el XENTRY Diagnosis Kit 3 con el XENTRY Diagnosis Kit 4?
 - El concepto de equipos se mantiene como el XENTRY Diagnosis Kit 3. Básicamente se modificó el XENTRY Diagnosis Pad 2.
 - La conexión WiFi entre el XENTRY Diagnosis Pad 2 y el VCI ya no se establece mediante dos dispositivos WiFi, el XENTRY Diagnosis Pad 2 cuenta con una segunda tarjeta WLAN. Esta garantiza una conexión estable a largas distancias.
 - El XENTRY Diagnosis Pad 2 dispone de un visualizador multitáctil capacitivo Full HD de 13,3 pulgadas con un brillo de 400 nits, cuatro conexiones USB 3.0 tipo A y una conexión USB tipo C.
- ¿Cuál es la novedad fundamental del XENTRY Diagnosis Kit 4?
 - Las novedades fundamentales son: el visualizador multitáctil capacitivo Full HD de 13,3 pulgadas,
 - además, se montó una segunda tarjeta WLAN que permite una conexión estable a largas distancias entre el XENTRY Diagnosis Pad 2 y el VCI.
- ¿De cuáles conexiones dispone el XENTRY Diagnosis Pad 2?
 - El XENTRY Diagnosis Pad 2 cuenta con cuatro conexiones USB 3.0 tipo A y una conexión USB tipo C.

Puesta en servicio

- ¿Qué debo tener en cuenta al poner en servicio el XENTRY Diagnosis Kit 4?
 - La puesta en servicio del XENTRY Diagnosis Kit 4, como ya es conocido de XENTRY Diagnosis Kit 3, se lleva a cabo a través de ConfigAssist. Este se inicia automáticamente con la primera puesta en servicio y le guía durante la puesta en servicio. Puede volver a iniciarla en cualquier momento mediante el icono en el escritorio.
- ¿Cuánto tiempo toma poner en servicio el XENTRY Diagnosis Kit 4?
 - Por lo general, es posible realizar la primera puesta en servicio en menos de 15 minutos.

Funcionamiento

- ¿Puedo utilizar la estación de acoplamiento de XENTRY Diagnosis Kit 3 también para el XENTRY Diagnosis Kit 4?
 - El XENTRY Diagnosis Pad 2 se distingue radicalmente de su predecesor XENTRY Diagnosis Pad, por tanto no es posible utilizar la misma estación de acoplamiento. En XENTRY Portal encontrará información sobre los accesorios correspondientes.
- ¿Qué accesorios están disponibles para el XENTRY Diagnosis Kit 4?
 - Los accesorios disponibles están listados de forma centralizada en XENTRY Portal.

- ¿Por qué en el volumen de suministro ya no se incluyen los mismos adaptadores de cable, como era habitual en XENTRY Diagnosis Kit 3?
 - Su poca utilización ha sido determinante en esto. Solo aprox. 5 % de las sesiones de diagnóstico en todo el mundo se realiza con adaptadores de cable. Además, todos los talleres ya están equipados con los adaptadores, en muchos casos en mayor cantidad. Los adaptadores de cable del volumen de suministro de XENTRY Diagnosis Kit 3 se pueden continuar utilizando y no deben devolverse al finalizar el período de vigencia del contrato. Puede utilizarlos para el XENTRY Diagnosis Kit 4.
 - Además, tiene la posibilidad de pedir todos los adaptadores de cable por separado. Un listado de los adaptadores de cable se encuentra en XENTRY Portal.

Actualización

- ¿Cómo puedo actualizar mi XENTRY Diagnosis Kit 4?
 - La actualización del XENTRY Diagnosis Kit 4 se efectúa, como de costumbre, a través del XENTRY Update Service con Retail Data Storage.
- ¿Existe todavía la posibilidad de actualizar el XENTRY Diagnosis Kit 4 con un disco Blu-ray?
 - Desde finales de 2019, los sistemas de diagnóstico XENTRY solo pueden actualizarse online a través del XENTRY Update Service.

Red

- ¿Cómo puedo conectar entre sí el XENTRY Diagnosis Pad 2 y el XENTRY Diagnosis VCI?
 - Hay dos posibilidades:
 - Conexión WLAN: puede establecer una conexión directa mediante WLAN de la forma habitual. Para ello se debe realizar un acoplamiento. Esto se realiza durante la primera puesta en servicio mediante el ConfigAssist o bien posteriormente en el VCI Manager.
 - Conexión por cable: mediante el cable de conexión USB suministrado.
- ¿Qué tipos de cifrado WLAN debo utilizar en el taller para el XENTRY Diagnosis Kit 4?
 - WPA2 (recomendado) y WPA
- ¿Existe una relación de los países certificados para el uso de WLAN?
 - Una vista de conjunto de los países certificados se encuentra en el folleto de TI que puede descargar de la zona de descargas.

Pedido

- ¿Puedo cambiar prematuramente mi sistema existente por el nuevo XENTRY Diagnosis Kit 4?
 - No. Los contratos de alquiler para los sistemas XENTRY Diagnosis Kit 3 mantienen el período de vigencia del contrato acordado. Una rescisión anticipada o un intercambio prematuro no son posibles. Tras finalizar el plazo de vigencia, los equipos pueden sustituirse por el nuevo XENTRY Diagnosis Kit 4 mediante pedido de renovación.
- ¿Dónde puedo pedir el XENTRY Diagnosis Kit 4?
 - Infórmese en su representación nacional sobre el proceso de pedido específico en su país.

- ¿Cuáles variantes de producto se pueden pedir?
 - Pueden pedirse las siguientes variantes:
 - XENTRY Diagnosis Kit 4 (consta de XENTRY Diagnosis Pad 2 y XENTRY Diagnosis VCI)
 - XENTRY Diagnosis Kit 4 Scope (incl. la técnica de medición XENTRY Scope). XENTRY Scope también puede pedirse por separado.
- ¿Qué incluye el primer volumen de suministro del XENTRY Diagnosis Kit 4?
 - El primer volumen de suministro incluye:
XENTRY Diagnosis Pad 2 con fuente de alimentación incl. enchufe de red, XENTRY Diagnosis VCI, cable de conexión USB (5 m), cable OBD (de 16 polos), informaciones para el usuario e indicaciones de seguridad. Tenga en cuenta que los adaptadores de cable ya no se incluyen el volumen de suministro estándar y pueden pedirse por separado según la demanda.
- ¿Cuáles son los modelos de alquiler o compra que existen?
 - Siempre existe la posibilidad de alquilar o comprar el XENTRY Diagnosis Kit 4. Infórmese en su representación nacional sobre el proceso de pedido específico en su país.

14. Glosario

Término	Descripción	Capítulo
AddOns	<ul style="list-style-type: none"> ▪ Los AddOns se instalan automáticamente en su XENTRY Diagnosis Pad 2 y actualizan su sistema. El requisito para ello es que el XENTRY Diagnosis Pad 2 esté conectado a internet. ▪ Tenga en cuenta que siempre deben estar instalados todos los AddOns en el XENTRY Diagnosis Pad 2 	4.5
AKT	<ul style="list-style-type: none"> ▪ Test breve automático 	4.8
ASRA	<ul style="list-style-type: none"> ▪ Textos estándar y de trabajo, tiempos guía y unidades de trabajo ▪ Los datos proporcionados por ASRA constituyen la base para elaborar presupuestos, encargos, facturas y solicitudes de garantía de forma precisa. 	
ConfigAssist	<ul style="list-style-type: none"> ▪ Ayuda en la configuración paso a paso del sistema de diagnóstico, desde la conexión de los cables y la configuración de la red hasta la instalación de la StartKey ▪ Se abre automáticamente al realizar la primera puesta en marcha y puede volver a abrirse en caso necesario 	3
Actualizaciones de software de diagnóstico	<ul style="list-style-type: none"> ▪ Las actualizaciones de software de diagnóstico se controlan a través del Update Center. Estas se realizan como actualización online con Retail Data Storage o, excepcionalmente, sin Retail Data Storage 	3.3
PDF Center	<ul style="list-style-type: none"> ▪ Impresora de PDF para generar documentos PDF con comodidad 	7.4
DiBA	<ul style="list-style-type: none"> ▪ Las instrucciones de servicio digitales se necesitan para la puesta en marcha de unidades de control. Si se usa un Retail Data Storage, puede comprobar la disponibilidad de DiBAs mediante el XENTRY Update Service Control Center 	4.7
Actualización del firmware	<ul style="list-style-type: none"> ▪ En ocasiones se debe actualizar el firmware del XENTRY Diagnosis VCI después de una actualización del software de diagnóstico. 	7.3.2
Acoplamiento/a coplar	<ul style="list-style-type: none"> ▪ Entre XENTRY Diagnosis Pad 2 y VCI se establece una conexión 1:1 mediante WLAN. El proceso recibe el nombre de "acoplamiento". 	3.2
OBD	<ul style="list-style-type: none"> ▪ Diagnóstico de a bordo (del inglés "On-board Diagnostics") 	2
DVD Regio	<ul style="list-style-type: none"> ▪ Los DVD Regio se necesitan para la puesta en marcha de unidades de control. Si se usa un Retail Data Storage, puede comprobar la disponibilidad de DiBAs mediante el XENTRY Update Service Control Center 	4.7
Retail Data Storage	<ul style="list-style-type: none"> ▪ Almacenamiento de red para el almacenamiento intermedio de actualizaciones de diagnóstico en el XENTRY Update Service 	
StartKey	<ul style="list-style-type: none"> ▪ Sin la StartKey no pueden utilizarse las aplicaciones de diagnóstico. Define sus derechos de uso. Se puede pedir conjuntamente al realizar el pedido de XENTRY Diagnosis Kit 4. 	
Puesta en marcha de unidades de control	<ul style="list-style-type: none"> ▪ Por "puesta en marcha de unidades de control" se entiende la programación de unidades de control de un vehículo utilizando el XENTRY Diagnosis Software 	
Support Tool	<ul style="list-style-type: none"> ▪ Herramienta con información para el caso de asistencia técnica y para la creación de paquetes de asistencia técnica 	7.5
Update Center	<ul style="list-style-type: none"> ▪ El Update Center sirve para instalar nuevas actualizaciones de software y cambiar entre los releases instalados (comutación de releases), así como para instalar y administrar AddOns. 	7.2
VCI Manager	<ul style="list-style-type: none"> ▪ El VCI Manager permite el acoplamiento del XENTRY Diagnosis Pad 2 y XENTRY Diagnosis VCI 	7.3
WIS	<ul style="list-style-type: none"> ▪ Sistema de información para el taller ▪ Contiene información detallada e instrucciones de trabajo para tareas de reparación y mantenimiento de las marcas Mercedes-Benz, Maybach y smart. 	
XENTRY Diagnosis Kit 4	<ul style="list-style-type: none"> ▪ Agrupación de productos: XENTRY Diagnosis Pad 2 y XENTRY Diagnosis VCI 	5

XENTRY Diagnosis Pad 2	▪ Un PC apto para talleres en el que esté instalado el XENTRY Diagnosis Software	5.1
XENTRY Diagnosis VCI	▪ El multiplexor o Vehicle Communication Interface (VCI) que constituye la interfaz del vehículo con el XENTRY Diagnosis Pad 2 mediante la interfaz OBD y que "traduce" los datos del vehículo para que el software pueda evaluarlos	5.2
XENTRY Update Service	▪ El XENTRY Update Service es la posibilidad de cargar actualizaciones en el XENTRY Diagnosis Pad 2 a través de internet. Los discos Blu-ray ya no se pueden reutilizar	3.3

Tabla 4: Glosario

15. Índice de ilustraciones

Ilustración 1: Volumen de suministro del XENTRY Diagnosis Kit 4	6
Ilustración 2: Icono del ConfigAssist	7
Ilustración 3: Configurar red WLAN	8
Ilustración 4: WLAN conectada	9
Ilustración 5: Configuración manual de la red	9
Ilustración 6: Introducir los datos de forma manual	10
Ilustración 7: Configurar red WLAN	11
Ilustración 8: Configuración del proxy	12
Ilustración 9: Servidor WIS/ASRA	12
Ilustración 10: Vista de conjunto de la StartKey	13
Ilustración 11: Acoplamiento del XENTRY Diagnosis VCI	14
Ilustración 12: Acoplamiento correcto con el XENTRY Diagnosis VCI	14
Ilustración 13: XENTRY Update Service con Retail Data Storage	15
Ilustración 14: XENTRY Update Service sin Retail Data Storage	16
Ilustración 15: Relación de la configuración del sistema	17
Ilustración 16: Exportación de la configuración	18
Ilustración 17: Ilustración del XENTRY Diagnosis Pad 2	24
Ilustración 18: Variante de conexión 1: WLAN	25
Ilustración 19: Variante de conexión 2: WLAN y USB	25
Ilustración 20: Variante de conexión 3: LAN y WLAN	25
Ilustración 21: Variante de conexión 4: LAN y USB	25
Ilustración 22: Icono del Update Center	26
Ilustración 23: Pantalla de inicio del Update Center	26
Ilustración 24: Comutación de releases en el Update Center	27
Ilustración 25: AddOns instalados	28
Ilustración 26: Abrir el panel de control	29
Ilustración 27: Hardware y sonido - Ver dispositivos e impresoras	30
Ilustración 28: Impresoras instaladas actualmente	31
Ilustración 29: Impresora detectada, instalación en curso	32
Ilustración 30: Impresora instalada	33
Ilustración 31: Software de unidades de control disponibles	45
Ilustración 32: Icono XENTRY Diagnosis AKT	46
Ilustración 33: Inicio de sesión en XENTRY Diagnosis AKT	46
Ilustración 34: Pantalla de inicio de XENTRY AKT	47
Ilustración 35: Ejecución del XENTRY AKT	47
Ilustración 36: Acceso directo a XENTRY WIS	49
Ilustración 37: Acceso directo a XENTRY Operation Time	50
Ilustración 38: Acceso directo a XENTRY WIS/Operation Time desde el marco de XENTRY	51
Ilustración 39: Acceso directo a XENTRY WIS/ Operation time desde la sesión de diagnóstico	52
Ilustración 40: Diagramas de cableado específicos del vehículo a través de "Dynamic Wiring Diagram"	53
Ilustración 41: Visión general de los componentes dentro del diagrama del circuito	54
Ilustración 42: Selección de los componentes y el lugar de instalación correspondiente	54
Ilustración 43: Vista del XENTRY Diagnosis Pad 2	55
Ilustración 44: Conexiones del XENTRY Diagnosis Pad 2	56
Ilustración 45: XENTRY Diagnosis VCI	57
Ilustración 46: Conexión del XENTRY Diagnosis VCI	59
Ilustración 47: Indicadores de estado y elementos de mando del XENTRY Diagnosis VCI	60
Ilustración 48: Indicadores de estado del VCI	60
Ilustración 49: Tecla del VCI	60
Ilustración 50: Accesorios de pedido opcional	61
Ilustración 51: Estación de acoplamiento (dockingstation)	61
Ilustración 52: XENTRY Scope	62

Ilustración 53: Vista de conjunto del Update Center	63
Ilustración 54: Icono del VCI Manager	64
Ilustración 55: Llamada del VCI	64
Ilustración 56: Indicación de actualización	65
Ilustración 57: Iniciar actualización	65
Ilustración 58: Confirmación de la actualización del firmware.....	66
Ilustración 59: Recuperación del sistema del XENTRY Diagnosis VCI.....	67
Ilustración 60: Configuración del canal WLAN	68
Ilustración 61: Icono de la Support Tool	70
Ilustración 62: Creación de tiques XSF	70
Ilustración 63: Icono de la biblioteca "Diagnosis Files".....	70
Ilustración 64: Lugar de ubicación de paquetes de asistencia.....	71
Ilustración 65: Selección de componentes tique XSF	73
Ilustración 66: Anexos de archivo tique XSF	74

Índice de tablas

Tabla 1: Datos técnicos del XENTRY Diagnosis VCI	58
Tabla 2: Estado del VCI Monitor	72
Tabla 3: Certificaciones WLAN	112
Tabla 4: Glosario.....	117

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